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SMITHSONIAN INSTITUTION

Fiscal Year 1982

Justification of Estimates of Appropriations
To the Office of Management and Budget



ADMINISTRATIVELY CONFIDENTIAL

(Information not to be released until after the President's
Budget is submitted to the Congress in January 1981.)

September 1980

SMITHSONIAN INSTITUTION
Fiscal Year 1982 Appropriations Request

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SMITHSONIAN INSTITUTION
SUMMARY AND HIGHLIGHTS OF THE FY 1982 ZERO-BASE BUDGET

The accompanying materials that detail the Smithsonian Institution's proposed FY 1982 zero-base budget include decision package sets for the Salaries and Expenses, Construction (National Zoological Park and Restoration and Renovation of Buildings), South Quadrangle Construction, and the Special Foreign Currency Program appropriation accounts. A ranking sheet that represents the Institution's priorities and an explanation of the ranking are provided also. The South Quadrangle Construction request, which would involve one-time funding, and the Special Foreign Currency Program, whose resource request is expressed in excess foreign currencies, are not competitively ranked against other accounts. Accompanying information is presented on the Institution's nonappropriated Trust fund accounts.

Zero-Base Budget Process

The Smithsonian's FY 1982 zero-base budget submission was developed from the lowest practicable organizational level upward with the active participation of all managers. The Trust fund budget was developed simultaneously and in coordination with the Federal zero-base budget. (The Institution's FY 1980 and FY 1981 Trust fund budget and projections for FY 1982 through FY 1986 accompany this document.) Following guidance from the Secretary that outlined his views on the Institution's budget priorities and starting with program areas of emphasis and financial projections for FY 1982 as they appear in the Five-Year Prospectus FY 1981 - FY 1985, each decision unit prepared its own Salaries and Expenses budget. The decision units consist of the approximately 60 organizational entities (museums, bureaus, or offices) that receive an annual allocation of funds on the basis of which managers must make significant decisions about the scope and the distribution of work to be performed.

The next step involved the preparation of consolidated Salaries and Expenses decision packages by each Assistant Secretary (Science, History and Art, Public Service, Museum Programs, and Administration). The consolidated decision packages reflect critical review and analysis and express the most important areas of emphasis at this management level.

The development of the Restoration and Renovation (R&R) account proceeded simultaneously with the Salaries and Expenses review process. The Five-Year Prospectus FY 1981 - FY 1985, also provided the starting point for formulating the FY 1982 R&R budget request. The Office of Facilities Services (OFS) distributed to the bureaus a listing and description of all R&R needs that had been identified and scheduled for their facilities for the next five or more years. The Office of Facilities Services and appropriate staff members then met individually with each bureau to review all identified projects, to add newly identified needs and to establish tentative priorities for FY 1982. Subsequently, each Assistant Secretary reviewed the recommendations of the bureaus that report to him, and established a consolidated priorities listing of recommended FY 1982 projects.

The integration of the Salaries and Expenses, Restoration and Renovation of Buildings and National Zoological Park Construction decision packages and the ranking of these decision packages was accomplished

by the Executive Committee whose members include the Under Secretary, the Assistant Secretaries, the Treasurer, and the Executive Assistant to the Secretary. Following the principles stated in the initial guidance provided by the Secretary, the Executive Committee made decisions on priorities among the functional areas (these are described in the "Decision Unit Overview" for the Salaries and Expenses appropriation) that would be emphasized, specific items to be included in the construction request, and the overall ranking of the decision packages.

The final steps in the process consisted of overall review and final approval of the proposed FY 1982 budget by the Under Secretary and the Secretary. The Executive Committee of the Board of Regents has reviewed the proposed FY 1982 Federal budget, the FY 1981 nonappropriated Trust fund budget, and the FY 1982 Trust fund projection. Review of these budgets by the full Board of Regents is scheduled for September 22, 1980.

FY 1982 Proposed Budget

The following table shows the proposed Salaries and Expenses, Construction, and Special Foreign Currency appropriation accounts from the minimum level through the sum total of enhancement levels.

Appropriation	FY 1982 Budget Request											
	FY 1981 Appropriation Estimates		Minimum Level		Intermediate Level		Current Level		Current Services Level		Enhancement Level	
	FTP		FTP		FTP		FTP		FTP		FTP	
	Pos	\$000	Pos	\$000	Pos	\$000	Pos	\$000	Pos	\$000	Pos	\$000
Salaries and Expenses	3,360	118,838	3,033	108,390	3,243	114,945	3,360	118,838	3,373	125,941	3,450	142,580
Construction ^{/1}	-	11,829	-	39,785	-	39,785	-	39,785	-	39,785	-	39,785
Special Foreign Currency Program	-	3,650	-	5,500	-	5,500	-	5,500	-	5,500	-	5,500
Total	3,360	134,317	3,033	153,675	3,243	160,230	3,360	164,123	3,373	171,226	3,450	187,865

^{/1} Includes Restoration and Renovation of Buildings, National Zoological Park, and South Quadrangle Appropriation Accounts.

In the Salaries and Expenses appropriation, the minimum and intermediate levels represent reductions of approximately ten and four percent respectively from the current level. Reductions to reach these levels are made in such a way that the Institution's major programs could continue to exist, although they would be severely reduced in scope, especially when these cutbacks are coupled with the effects of inflation. Nearly all of the program cuts at the minimum and intermediate levels are restored at the current level. Also, at the current level, an amount of \$.6 million of base resources is redirected from lower to higher priority programs. With the \$.26 million of base resources that were reapplied in FY 1979, FY 1980 and FY 1981, the Institution will have reapplied approximately \$.32 million in base resources over a four year period to cover high priority requirements before any budget increases were sought.

This budget includes three separate decision packages at the current services level. The approval of these current services packages would enable the Institution's programs to continue at approximately the same level in FY 1982 as planned for FY 1981. Resources included in these packages are designated to meet the statutory requirements of within-grade increases, of the merit pay provision of the Civil Service Reform Act, and of the annualization of the anticipated FY 1981 pay raise; to help offset the overall effects of inflation in the expenses portion of the Salaries and Expenses budget consistent with the economic assumptions supplied by Office of Management and Budget; to cover the projected higher costs to the Institution of utilities and rent; and to continue to meet the one-time equipment costs and the continuing operating needs of the Museum Support Center.

In the Salaries and Expenses appropriation, the Institution is requesting a total of nine enhancement level decision packages each of which represents a functional category. These consist of exhibitions and performances, research, collections management, education and public orientation, collections acquisition, facilities management, protection services and administration, and other national services. (The functional categories are defined in the decision unit overview for the Salaries and Expenses appropriation.)

Enhancement level resources are proposed for the Institution to undertake new initiatives and to make continued progress in several continuing programs.

Major new initiatives included in this budget would contribute to the enjoyment of millions of visitors to the Smithsonian as well as help to assure the continued intellectual growth and vitality of our staff. They consist of the reestablishment of a competitive Research Awards Program that would encourage Smithsonian scientists and scholars once again to compete for support funds for innovative research projects (the Program was funded by the Congress between FY 1966 - FY 1979); the funding of a Special Exhibits Gallery in the National Museum of Natural History for the regular showing of major, exciting traveling exhibitions as well as those developed at the Museum based on its own collections; the revitalization of the treatment of Native American Collections at the National Museum of Natural History and the National Museum of History and Technology; and the establishment of a fund of \$10 million, which would represent a no-year appropriation and be replenished as it is used, for the purchase of truly outstanding and important objects and collections of objects.

The additional resources sought to build on and to improve existing Smithsonian programs would be applied to all functional categories. There is provision for the strengthening of collections management through a

proposed acceleration of the Institution's Collections Management/Inventory Program, the improvement of collections storage areas, and remedial conservation work. Programs of basic and original research are proposed. These would result in the development of base line data having significant practical application, and of new insights based on Smithsonian collections. Also in the research category, support funds for publications, data processing, supplies and equipment, and travel funds are requested. In the exhibitions and performances area, the Institution is seeking to improve the overall quality of Smithsonian exhibitions by refurbishing exhibit halls and galleries, and by increasing support for exhibitions - related publications and exhibits production. In addition to the Major Acquisitions Program already noted, additional funds are sought to increase the acquisitions bases of four History and Art museums and galleries so that they will be able to maintain important and representative collections in their fields.

New resources are proposed in the facilities management, protection services, and administration category for the continuation of planned improvements, with particular emphasis on promoting equal employment opportunity, strengthening the Institution's security force, and improving architectural and design capabilities. Funds are requested also for the purchase of the majority of photo copier equipment that is presently leased throughout the Institution. Such purchase would result in significant cost savings.

Finally, funds are included to bring the National Museum Act to its authorized level of \$1 million.

The Institution is seeking an additional 90 full-time permanent positions (including 25 term positions) in this budget. Following OMB Circular A-64 dated July 30, 1980, the full-time permanent and other than full-time permanent positions are expressed in terms of workyears throughout this budget presentation.

Two Construction decision packages are submitted. One is a consolidated request for the Restoration and Renovation of Buildings, and the National Zoological Park construction programs; the other represents one-time construction funding for the proposed South Quadrangle development project. Both of these packages are vitally important to the Institution because they would enhance the experience of our visitors and allow the Institution to fulfill its responsibilities to provide proper care of the collections and the physical plant, much of which is of great historical value.

With resources sought in the Restoration and Renovation portion of the first construction request, progress is planned in repairing building facades, roofs and terraces of various historic and monumental buildings; upgrading, including planning and installation of fire detection and suppression systems; providing improved access for the disabled and the correction of conditions that could be hazardous to the safety and security of the visiting public, staff and the collections; repairing and improving utility systems in several museums and collections storage buildings, including heating, ventilation and air conditioning systems and plumbing and electrical systems (these improvements would promote energy efficiency); making improvements in support of programmatic objectives at the Smithsonian's outlying facilities; and making general repairs and improvements that are required for a variety of purposes. The Zoo portion of this request will be used to begin construction of one of the last major projects under the Master Plan - an Aquatic Habitats exhibit. Zoo funds are sought also for completion of a Delicate Animal Facility at the Front Royal Conservation and Research Center and for necessary restoration and renovation work both at Rock Creek and Front Royal.

The second construction request is devoted exclusively to the Smithsonian's South Quadrangle development project which is a very high Institutional priority. The proposed resources will be used, in conjunction with nonappropriated Trust funds, to construct new facilities for a permanent home for the Museum of African Art, a center for Eastern art in association with the Freer Gallery of Art, an educational center for the National and Resident Associates, public galleries and administrative space for the Smithsonian Institution Traveling Exhibition Service, a rare book library, and underground parking.

Finally, the Special Foreign Currency decision package includes funds to continue a program of grants to United States' universities, museums and other institutions of higher learning for field research and professional training; for a United States' contribution to the international effort organized through UNESCO to restore and preserve the Indus civilization city of Moenjodaro in Pakistan; and for a third installment to the forward-funded reserve in support of future programs of the American Institute of Indian Studies.

Nonappropriated Trust Funds

Overview

In addition to Federal appropriations, the Institution has two major sources of nonappropriated funding. These are the Smithsonian Trust funds from a variety of sources and Federal agency grants and contracts. Overall, between FY 1980 and FY 1986, nonappropriated Trust funds are expected to comprise an average of approximately 46 percent of gross operating revenues, and an average of approximately 21 percent of net operating revenues. The distinction between net and gross revenues is important in that net revenues represent the funds that are available to the Institution after the expenses of auxiliary and bureau activities are deducted. It should be borne in mind that nonappropriated Trust fund projections of income are heavily dependent upon forecasts of general economic conditions, and are, therefore, subject to a substantial degree of uncertainty.

The accompanying tables display the sources (Table 1) and the application (Table 2) of all operating funds projected to be available to the Institution from FY 1980 - FY 1986 following the format in the Institution's "Five-Year Prospectus" which will be transmitted to the Office of Management and Budget during September. In addition, a summary table is provided showing the source and application of funds for the budget year (Table 3). (The proposed budgets have been reviewed by the Executive Committee of the Board of Regents; however, they are subject to approval by the full Board of Regents which is scheduled to meet on September 22, 1980.)

Proposed FY 1982 Nonappropriated Trust Fund Budget

For FY 1982, the Institution is projecting gross operating revenues of \$269.3 million of which \$142.6 million constitutes the request of the S&E appropriation, \$11 million, projected pay supplemental requirements, and \$115.7 million represents the gross total of all nonappropriated sources. In terms of net operating income, a total of \$189.6 million is projected to be available to the Institution in FY 1982, of which an amount of \$36.0 million is expected to be derived from nonappropriated sources. All monies coming to the Institution are dedicated to the same broad objectives of increasing and diffusing knowledge. There are, however,

important differences in specific uses and in restrictions imposed on these funds. The following sections address the nonappropriated Trust fund budget by type of fund.

Unrestricted (General and Special Purpose) Funds

For FY 1982, a net amount of \$13.4 million in unrestricted Trust funds is expected to be realized for program and administrative purposes, a projected increase of \$800 thousand over FY 1981. The unrestricted funds include funds generated from interest on the Smithsonian bequest, endowment and current fund investments, concessions such as food services, parking royalties, sales of Smithsonian products, including records and books, the Resident and National Associates program including Smithsonian magazine, and the museum shops. They also include unrestricted gifts or bequests of funds.

For FY 1982, these funds are expected to be used as follows (in general, consistent with uses in FY 1980 and FY 1981 and in the projections for FY 1983 - FY 1986):

1) An allotment (centrally administered) of \$2 million to be used for acquisitions for the collections and scholarly and educational programs. /1 Of this amount, \$1 million is available for purchase of objects of importance to the collections. An additional \$500 thousand is designated for scholarly projects that do not lend themselves to Federal funding, including unanticipated research opportunities such as meteorite falls. The remaining \$500 thousand is allocated to carry out innovative educational projects designed to reach large segments of the public.

2) An allotment of \$1 million to fund the Institution's centrally administered Fellowship Program, Regents fellowships and the Fellowship and Visiting Scholars Program of the Smithsonian Astrophysical Observatory and Radiation Biology Laboratory. /2 By FY 1982, the amount of Trust funds devoted to these programs will have increased over FY 1981 by \$100 thousand, reflecting, in part, the need to make higher stipends to offset the effects of inflation.

3) Operating allotments to the Cooper-Hewitt Museum, the Folklife Unit, the Office of Telecommunications and the Visitor's Information and Associates Reception Center and additional small but important allotments to other bureaus. These allotments are expected to total approximately \$2.7 million in FY 1982 which also include a continuing \$100 thousand allotment for an equal employment opportunity Cooperative Education Program and other affirmative action efforts. In addition to this amount there is a one-time allotment of \$750 thousand for the purchase of conservation equipment at the Museum Support Center.

4) An amount of \$1.7 million for the Institution's administrative costs not recovered from overhead fees assessed against grants and contracts administered by the Smithsonian or from administrative fees charged to other Trust funded activities. /3

/1 This program was instituted in FY 1978.

/2 This program was instituted in FY 1979. Prior to FY 1979, Federal funds were used to support the majority of these programs.

/3 Unrestricted Trust funds are allocated to the administrative and support units to provide an appropriate balance between Federal appropriations and Trust funds, reflecting the services they provide.

5) In FY 1982, an amount of \$2.2 million will be realized by the bureaus in special purpose funds to be used for research, exhibitions, education and other purposes. These funds are generated from interest earned on the Institution's short-term investments, net proceeds of bureau activities of which the National Air and Space Museum theater is the most prominent example and other miscellaneous revenues. The above amount also takes into account revenue sharing, Smithsonian Society, Fluid Research and \$300 thousand of National Air and Space Museum theater proceeds which are transferred into the Institution's general unrestricted fund.

6) Transfer of Plant funds of \$1 million for the South Quadrangle project (in addition to about \$3.4 million transfers for FY 1979 thru FY 1981).

7) Annual transfer of \$2 million to the Institution's unrestricted endowment.

Federal Grants and Contracts

Grants and contracts awarded to the Smithsonian by government agencies and departments are expected to total an amount of \$17.3 million in FY 1982, an estimated increase of \$900 thousand over FY 1981. These grants and contracts are provided to the Smithsonian to support specific types of research, educational and other projects which the Institution can undertake as a result of its expertise or its ability to respond quickly to certain kinds of needs. Virtually all of these grants and contracts are anticipated for research conducted by the science bureaus of the Institution, mainly at the Smithsonian Astrophysical Observatory which has three approved programs, Infrared Telescope, Lyman-Alpha Coronagraph and x-ray flight experiment, on the space shuttle for the National Aeronautics and Space Administration.

Restricted Funds

Restricted income is expected to total \$5.3 million in FY 1982, approximately the same amount is anticipated for FY 1981. Restricted income to the Institution is derived primarily from investment income (endowment earnings and interest on current funds), and gifts for specific purposes, with small amounts from revenue-generating activities of the Freer Gallery of Art and the Archives of American Art. Major shares of restricted endowment investment income are dedicated to the Freer Gallery of Art, and the Fort Pierce, Florida, Oceanographic Bureau for basic research purposes; restricted income to other units provides support for specific research, exhibitions, and education projects.

SMITHSONIAN INSTITUTION
SOURCE OF OPERATING FUNDS
FY 1980 PROJECTED THROUGH FY 1986

Table 1

(\$000)

SOURCE OF OPERATING FUNDS	FY 1980	FY 1981	FY 1982	FY 1983	FY 1984	FY 1985	FY 1986
Federal Salaries and Expenses	107,764	118,838	142,580	156,695	160,412	166,895	176,733
.Plus cumulative effect of legislated pay raises	-	5,200	11,000	17,000	24,000	31,000	39,000
Subtotal	107,764	124,038	153,580	173,695	184,412	197,895	215,733
Nonappropriated Trust Funds							
Unrestricted General							
.Investments	2,500	2,250	2,500	2,550	2,600	2,650	2,675
.Gifts	50	50	50	50	50	50	50
.Auxiliary Activities	71,081	79,624	86,560	93,785	101,018	109,696	118,109
.Miscellaneous	50	50	50	50	50	50	50
Subtotal	73,681	81,974	89,160	96,435	103,718	112,446	120,884
Unrestricted Special Purpose							
.Investments	350	343	397	410	425	450	475
.Gifts	84	50	50	50	50	50	50
.Bureau Activities	2,071	2,869	2,910	3,000	3,100	3,200	3,300
.Miscellaneous	532	557	657	700	750	800	850
Subtotal	3,037	3,819	4,014	4,160	4,325	4,500	4,675
Restricted							
.Investments	2,400	2,425	2,650	2,675	2,700	2,725	2,750
.Gifts, Grants and Contracts	2,100	2,100	1,800	1,800	1,800	1,800	1,800
.Miscellaneous	700	800	850	875	900	925	950
Subtotal	5,200	5,325	5,300	5,350	5,400	5,450	5,500
Federal Grants and Contracts	14,296	16,384	17,281	20,945	20,155	19,726	16,645
Gross Income	203,978	231,540	269,335	300,585	318,010	340,017	363,437
Less Expenses of Auxiliary and Bureau Activities	(63,999)	(73,197)	(79,779)	(85,626)	(93,266)	(101,280)	(110,345)
Net Funds Provided	139,979	158,343	189,556	214,959	224,744	238,737	253,092

SMITHSONIAN INSTITUTION
APPLICATION OF OPERATING FUNDS
FY 1980 PROJECTED THROUGH FY 1986

Table 2(1)

(\$000)

APPLICATION OF OPERATING FUNDS	FY 1980	FY 1981	FY 1982	FY 1983	FY 1984	FY 1985	FY 1986
<u>Science</u>							
.Federal Salaries and Expenses	39,657	41,579	43,308	46,030	47,416	48,593	50,403
.Unrestricted General							
-Program and Administrative*	405	282	249	261	250	258	266
-Auxiliary Activities	-	-	-	-	-	-	-
.Unrestricted Special Purpose							
-Bureau Activities	1,128	1,197	1,351	1,426	1,495	1,569	1,646
-All Other	613	969	975	974	1,010	1,047	1,778
.Restricted	2,971	1,581	1,339	1,367	1,428	1,480	1,503
.Federal Grants and Contracts	<u>13,941</u>	<u>16,008</u>	<u>17,066</u>	<u>20,745</u>	<u>19,955</u>	<u>19,526</u>	<u>16,445</u>
Subtotal	58,715	61,616	64,288	70,803	71,554	72,473	72,041
<u>History and Art</u>							
.Federal Salaries and Expenses	18,092	19,084	20,314	21,701	22,334	23,476	24,281
.Unrestricted General							
-Program and Administrative	642	652	635	649	659	675	688
-Auxiliary Activities	-	-	-	-	-	-	-
.Unrestricted Special Purpose							
-Bureau Activities	621	781	827	819	858	896	935
-All Other	605	532	587	545	573	601	629
.Restricted	2,517	3,345	3,119	3,165	3,279	3,347	3,483
.Federal Grants and Contracts	<u>80</u>	<u>25</u>	<u>25</u>	<u>25</u>	<u>25</u>	<u>25</u>	<u>25</u>
Subtotal	22,557	24,419	25,507	26,904	27,728	29,020	30,041
<u>Public Service</u>							
.Federal Salaries and Expenses	2,326	2,498	2,588	2,663	2,754	2,831	2,936
.Unrestricted General							
-Program and Administrative	680	750	778	814	854	899	944
-Auxiliary Activities	8,450	9,567	8,597	9,103	10,154	10,601	11,197
.Unrestricted Special Purpose							
-Bureau Activities	-	-	-	-	-	-	-
-All Other	-	-	-	-	-	-	-
.Restricted	8	22	25	25	25	25	25
.Federal Grants and Contracts	<u>15</u>	<u>25</u>	<u>15</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>
Subtotal	11,479	12,862	12,003	12,605	13,787	14,356	15,102
*Net of SAO Overhead Recovery							9

SMITHSONIAN INSTITUTION
APPLICATION OF OPERATING FUNDS
FY 1980 PROJECTED THROUGH FY 1986

(\$000)

Table 2(2)

APPLICATION OF OPERATING FUNDS	FY 1980	FY 1981	FY 1982	FY 1983	FY 1984	FY 1985	FY 1986
<u>Museum Programs</u>							
.Federal Salaries and Expenses	8,568	9,096	9,876	12,135	12,516	12,942	13,246
.Unrestricted General							
-Program and Administrative	233	262	278	291	304	317	330
-Auxiliary Activities	850	1,065	1,312	1,368	1,495	1,584	1,738
.Unrestricted Special Purpose							
-Bureau Activities	105	63	65	42	48	53	58
-All Other	34	1	2	11	11	11	11
.Restricted	118	519	10	10	12	13	13
.Federal Grants and Contracts	75	99	25	25	25	25	25
Subtotal	9,983	11,105	11,568	13,882	14,411	14,945	15,421
<u>Special Programs</u>							
.Federal Salaries and Expenses	2,325	5,806	18,999	17,656	13,311	11,478	11,768
.Unrestricted General							
-Program and Administrative	599	593	1,369	580	562	545	521
-Auxiliary Activities	-	-	-	-	-	-	-
.Unrestricted Special Purpose							
-Bureau Activities	-	-	-	-	-	-	-
-All Other	6,222	3,114	3,221	3,810	3,910	3,960	4,010
.Restricted	43	193	78	136	161	139	154
.Federal Grants and Contracts	158	200	150	150	150	150	150
Subtotal	9,347	9,906	23,817	22,332	18,094	16,272	16,603
<u>Associates Programs</u>							
.Federal Salaries and Expenses	-	-	-	-	-	-	-
.Unrestricted General							
-Program and Administrative	290	271	285	300	315	330	347
-Auxiliary Activities	37,560	43,679	49,011	53,740	59,148	65,449	72,553
.Unrestricted Special Purpose							
-Bureau Activities	10	10	10	10	10	10	10
-All Other	1	-	-	-	-	-	-
.Restricted	20	-	-	-	-	-	-
.Federal Grants and Contracts	63	27	-	-	-	-	-
Subtotal	37,944	43,987	49,306	54,050	59,473	65,789	72,910

SMITHSONIAN INSTITUTION
APPLICATION OF OPERATING FUNDS
FY 1980 PROJECTED THROUGH FY 1986

(\$000)

Table 2(3)

APPLICATION OF OPERATING FUNDS	FY 1980	FY 1981	FY 1982	FY 1983	FY 1984	FY 1985	FY 1986
<u>Business Management</u>							
.Federal Salaries and Expenses	-	-	-	-	-	-	-
.Unrestricted General							
-Program and Administrative	-	-	-	-	-	-	-
-Auxiliary Activities	14,935	16,721	18,422	18,925	19,855	20,905	21,985
.Unrestricted Special Purpose							
-Bureau Activities	-	-	-	-	-	-	-
-All Other	-	-	-	-	-	-	-
.Restricted	-	-	-	-	-	-	-
.Federal Grants and Contracts	-	-	-	-	-	-	-
Subtotal	14,935	16,721	18,422	18,925	19,855	20,905	21,985
<u>Administrative, Financial and Technical Services</u>							
.Federal Salaries and Expenses	8,023	8,556	8,961	9,398	9,585	9,773	9,964
.Unrestricted General							
-Program and Administrative*	486	469	597	788	1,064	1,295	1,525
-Auxiliary Activities	340	114	184	193	203	213	223
.Unrestricted Special Purpose							
-Bureau Activities	-	-	-	-	-	-	-
-All Other	57	67	36	11	11	11	11
.Restricted	120	49	72	38	33	33	33
.Federal Grants and Contracts	-	-	-	-	-	-	-
Subtotal	9,026	9,255	9,850	10,428	10,896	11,325	11,756
<u>Facilities Services</u>							
.Federal Salaries and Expenses	28,773	32,219	35,334	40,312	41,996	43,402	45,635
.Unrestricted General							
-Program and Administrative	807	842	964	1,044	1,135	1,251	1,354
-Auxiliary Activities	-	-	-	-	-	-	-
.Unrestricted Special Purpose							
-Bureau Activities	-	-	-	-	-	-	-
-All Other	90	12	-	-	-	-	-
.Restricted	-	-	-	-	-	-	-
.Federal Grants and Contracts	-	-	-	-	-	-	-
Subtotal	29,670	33,073	36,298	41,356	43,131	44,653	46,989
*Net of S1 Overhead Recovery							11

SMITHSONIAN INSTITUTION
APPLICATION OF OPERATING FUNDS
FY 1980 PROJECTED THROUGH FY 1986

Table 2(4)

APPLICATION OF OPERATING FUNDS	FY 1980	FY 1981	FY 1982	FY 1983	FY 1984	FY 1985	FY 1986
<u>Inflation and Pay Requirements</u>							
.Federal Salaries and Expenses							
-Necessary Pay	-	-	1,500	3,200	5,000	6,900	8,900
-Inflation	-	-	1,700	3,600	5,500	7,500	9,600
-Supplemental	-	5,200	11,000	17,000	24,000	31,000	39,000
Subtotal	-	5,200	14,200	23,800	34,500	45,400	57,500
<u>Institutional Total</u>							
.Federal Salaries and Expenses	107,764	124,038	153,580	173,695	184,412	197,895	215,733
.Unrestricted General							
-Program and Administrative	4,142	4,121	5,155	4,727	5,143	5,570	5,975
-Auxiliary Activities	62,135	71,146	77,526	83,329	90,855	98,752	107,696
.Unrestricted Special Purpose							
-Bureau Activities	1,864	2,051	2,253	2,297	2,411	2,528	2,649
-All Other	7,622	4,695	4,821	5,351	5,515	5,630	6,439
.Restricted	5,797	5,709	4,643	4,741	4,938	5,037	5,211
.Federal Grants and Contracts	14,332	16,384	17,281	20,945	20,155	19,726	16,645
Gross Funds Applied	203,656	228,144	265,259	295,085	313,429	335,138	360,348
Less Expenses of Auxiliary and Bureau Activities	(63,999)	(73,197)	(79,779)	(85,626)	(93,266)	(101,280)	(110,345)
<u>Net Funds Applied Before Transfers</u>							
.Federal Salaries and Expenses	107,764	124,038	153,580	173,695	184,412	197,895	215,733
.Unrestricted General	4,142	4,121	5,155	4,727	5,143	5,570	5,975
.Unrestricted Special Purpose	7,622	4,695	4,821	5,351	5,515	5,630	6,439
.Restricted	5,797	5,709	4,643	4,741	4,938	5,037	5,211
.Federal Grants and Contracts	14,332	16,384	17,281	20,945	20,155	19,726	16,645
Net Before Transfers	139,657	154,947	185,480	209,459	220,163	233,858	250,003

SMITHSONIAN INSTITUTION
APPLICATION OF OPERATING FUNDS
FY 1980 PROJECTED THROUGH FY 1986

(\$000)

Table 2(5)

APPLICATION OF OPERATING FUNDS	FY 1980	FY 1981	FY 1982	FY 1983	FY 1984	FY 1985	FY 1986
Transfers: Out/(In)							
.Federal Salaries and Expenses*	-	-	-	-	-	-	-
.Current Funds Transfers (Internal)							
-Unrestricted General	4,112	3,305	3,440	4,025	4,115	4,189	4,303
-Unrestricted Special Purpose	(4,112)	(3,305)	(3,440)	(4,025)	(4,115)	(4,189)	(4,303)
.Current Funds to Plant Improvement							
-Unrestricted General	1,238	1,300	1,050	2,050	1,550	1,550	50
-Unrestricted Special Purpose	25	25	25	24	22	20	2,018
.Current Funds to Endowment							
-Unrestricted General	2,031	2,021	2,021	2,021	2,021	2,021	2,021
-Restricted	(50)	100	100	100	100	100	100
Total Transfers	<u>3,244</u>	<u>3,446</u>	<u>3,196</u>	<u>4,195</u>	<u>3,693</u>	<u>3,691</u>	<u>4,189</u>
Net Changes in Fund Balance:							
Increase (Decrease)							
.Unrestricted General	23	81	(32)	283	34	364	839
.Unrestricted Special Purpose	(2,362)	353	355	513	492	511	(2,128)
.Restricted	(547)	(484)	557	509	362	313	189
.Federal Grants and Contracts	<u>(36)</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>
Subtotal	<u>(2,922)</u>	<u>(50)</u>	<u>880</u>	<u>1,305</u>	<u>888</u>	<u>1,188</u>	<u>(1,100)</u>
Net Funds Applied							
.Federal Salaries and Expenses	107,764	124,038	153,580	173,695	184,412	197,895	215,733
.Unrestricted General	11,546	10,828	11,634	13,106	12,863	13,694	13,188
.Unrestricted Special Purpose	1,173	1,768	1,761	1,863	1,914	1,972	2,026
.Restricted	5,200	5,325	5,300	5,350	5,400	5,450	5,500
.Federal Grants and Contracts	<u>14,296</u>	<u>16,384</u>	<u>17,281</u>	<u>20,945</u>	<u>20,155</u>	<u>19,726</u>	<u>16,645</u>
Net Funds Applied	<u>139,979</u>	<u>158,343</u>	<u>189,556</u>	<u>214,959</u>	<u>224,744</u>	<u>238,737</u>	<u>253,092</u>
*Unobligated Funds Returned to Treasury							

(\$1,000's)

SMITHSONIAN INSTITUTION
Source & Application of Funds
Estimate FY 1982
(Excluding Foreign Currency Program)

Table 3

<u>OPERATING FUNDS</u>	Federal Approps.	Federal Gr. & Cont.	Unrest. Trust Funds		Restricted Trust Fds.	Total Op. Funds
Funds Provided:			General	Sp. Purp.		
Federal Appropriation	142,580	-	-	-	-	142,580
Investments	-	-	2,500	397	2,650	5,547
Gifts, Grants & Contracts	-	17,281	50	50	1,800	19,181
Self-generated - Gross Rev.						
Auxiliary Acts.	-	-	86,560	-	-	86,560
Bureaus	-	-	-	2,910	-	2,910
Other Misc.	-	-	50	657	850	1,557
Total Income	142,580	17,281	89,160	4,014	5,300	258,335
Less Expenses - Self Gener.						
Auxiliary Acts.	-	-	(77,526)	-	-	(77,526)
Bureaus	-	-	-	(2,253)	-	(2,253)
Net Funds Provided	142,580	17,281	11,634	1,761	5,300	178,556
Funds Applied: (Net)						
Science	43,308	17,066	3,141	975	1,339	65,829
Less: SAO O/H Recovery	-	-	(2,892)	-	-	(2,892)
History & Art	20,314	25	635	587	3,119	24,680
Public Service	2,588	15	778	-	25	3,406
Museum Programs	9,876	25	278	2	10	10,191
Special Programs	18,999	150	1,369	3,221	78	23,817
Associates Pgms/Bus. Mgmt.	-	-	285	-	-	285
Administration - SI	12,161*	-	5,797	36	72	18,066
Less: SI O/H Recovery	-	-	(5,200)	-	-	(5,200)
Facilities Services	35,334	-	964	-	-	36,298
Total Funds Applied	142,580	17,281	5,155	4,821	4,643	174,480
Transfers: Out (In)						
Current Funds						
-Bureau Revenue Sharing	-	-	349	(349)	-	-
-NASM Theatre	-	-	(300)	300	-	-
-Fellowships	-	-	1,041	(1,041)	-	-
-Special Programs	-	-	2,200	(2,200)	-	-
-Smithson Society	-	-	150	(150)	-	-
Plant Funds	-	-	1,050	25	-	1,075
Endowment Funds	-	-	2,021	-	100	2,121
Total Transfers	-	-	6,511	(3,415)	100	3,196
Change in Fund Balance	-	-	(32)	355	557	880
Ending Fund Balance	-0-	-0-	5,037	9,913	4,390	19,340

*Includes an amount of \$1,500 thousand for necessary pay and \$1,700 thousand for inflation which have not been distributed by unit.

SMITHSONIAN INSTITUTION
1982 Budget
Summary of Ranking*
(in thousands of dollars)

Ranking Numbers	Package Description			Decision Package Amounts			Cumulative Amounts		
	Type	Level	Comments	BA	Outlays	FTP Pos	BA	Outlays	FTP Pos
1	Sal. & Exp. 1000-1	Minimum	Reductions in all programs	108,390	109,243	3,033	108,390	109,243	3,033
2	Sal. & Exp. 1000-2	Intermediate	Restoration of certain reductions	6,555	5,958	210	114,945	115,201	3,243
3	Sal. & Exp. 1000-3	Current	Restoration of other reductions including changes in program emphasis	3,893	3,539	117	118,838	118,740	3,360
4	Construction 2000-1;2;3	Minimum, Intermediate, Current	Restoration and Renovation of Buildings; Construction, National Zoological Park	15,650	25,174	-	134,488	143,914	3,360
5	Sal. & Exp. 1000-4	Current Services I	Scheduled pay increases, utilities and rent increases	3,660	3,327	-	138,148	147,241	3,360
6	Sal. & Exp. 1000-5	Current Services II	Inflation	1,700	1,545	-	139,848	148,786	<u>3,360**</u>
7	Sal. & Exp. 1000-6	Current Services III	Museum Support Center-related costs	1,743	1,585	13	141,591	150,371	3,373
8	Sal. & Exp. 1000-7	Enhancement	Exhibitions & Performances	1,474	1,339	5	143,065	151,710	3,378
9	Sal. & Exp. 1000-8	Enhancement	Research	1,322	1,202	14	144,387	152,912	3,392

*Quadrangle Construction and Special Foreign Currency Program not ranked competitively.

**OMB personnel ceiling (Full-time Permanent).

Ranking Numbers	Package Description			Decision Package Amounts			Cumulative Amounts		
	Type	Level	Comments	BA	Outlays	FTP Pos	BA	Outlays	FTP Pos
10	Sal. & Exp. 1000-9	Enhancement	Collections Management	894	813	26	145,281	153,725	3,418
11	Sal. & Exp. 1000-10	Enhancement	Facilities Management, Protection Services and Administration I	1,759	1,599	31	147,040	155,324	3,449
12	Sal. & Exp. 1000-11	Enhancement	Education and Public Orientation	215	195	1	147,255	155,519	3,450
13	Sal. & Exp. 1000-12	Enhancement	Collections Acquisition I	320	291	-	147,575	155,810	3,450
14	Sal. & Exp. 1000-13	Enhancement	Other National Services	197	179	-	<u>147,772***</u>	155,989	3,450
15	Sal. & Exp. 1000-14	Enhancement	Collections Acquisition II	10,000	5,000	-	157,772	160,989	3,450
16	Sal. & Exp. 1000-15	Enhancement	Facilities Management, Protection Services and Administration II	458	416	-	158,230	161,405	3,450

***OMB dollar target level excluding amount of \$5.5 million for the Special Foreign Currency Program.

Rationale of the Decision Package Ranking

The ranking of the 16 decision packages proposed in this budget generally follows the priorities expressed in last year's presentation. Fourteen of the decision packages are included within the Office of Management and Budget target ceiling. The following considerations were taken into account when accomplishing the ranking.

First, the Construction accounts, including Restoration and Renovation of Buildings and the National Zoological Park following its Master Plan are very important to the Institution. Within the Office of Management and Budget dollar ceiling, a decision package that incorporates the minimum, intermediate, and current levels is given the fourth highest priority ranking. (The South Quadrangle development construction decision package, which is not ranked competitively following the OMB guidance, is nevertheless a very high priority of the Institution.)

Second, there are three "current services" decision packages. These consist of packages to cover the costs of: a) necessary pay (within-grade and merit pay increases and pay raise annualization), higher utilities and rent estimates; b) inflation in nonsalary areas, following Office of Management and Budget pricing policy guidelines; and c) an increment for the storage equipment, laboratory equipment and furnishings and additional staffing needs for the Museum Support Center. Resources included in these packages, ranked as priorities five, six and seven, would not permit enhancement of the Institution's programs. However, resources proposed at the current services levels do absorb \$7.103 million of the dollar ceiling received from Office of Management and Budget and require 13 additional full-time permanent positions as well.

Third, in addition to the Salaries and Expenses minimum, intermediate, and current levels, ranked as the numbers one, two, and three priorities, there are nine enhancement level packages for the Salaries and Expenses account. The seven enhancement packages included within the Office of Management and Budget dollar ceiling consist of: exhibitions and performances, research, collections management, facilities management, protection services, and administration, education and public orientation, collections acquisition and other national services. The fact that all of our functional categories are included within the Office of Management and Budget ceiling is indicative of the need to maintain a balanced and selective growth in Smithsonian programs.

Of two decision packages that are ranked over ceiling, one is for a new Major Acquisitions Program. The Program is ranked relatively low because of the large dollar amount required; however, it would be very desirable to be able to initiate the Program in FY 1982. The final decision package, for the purchase of the majority of photo copier equipment presently leased by the Institution, would result in cost savings within a three year time period.

DECISION UNIT OVERVIEW
Smithsonian Institution
Salaries and Expenses: 33-0100-0-1-503
Decision Unit 1000

Long-range goal: To promote the increase and diffusion of knowledge through original historical, cultural and scientific research; to develop and properly care for the National Collections as they represent invaluable resources for both study and display; to sponsor public programs including exhibitions, performances, publications and educational services; and to provide services to museums both in the United States and abroad.

Major objectives and budget initiatives:

To accomplish the long-range goal of the Institution, the Smithsonian conducts a broad variety of programs, in cooperation with other institutions, universities, and government agencies in the United States and abroad. These programs are described in terms of functional categories throughout this budget. These functional categories, in turn, represent the Institution's major objectives with overall resources detailed in terms of these categories. The functions include:

- Collections management: The Smithsonian Institution has the legal responsibility (20 U.S.C. 59) to serve as the official repository of the National Collections which contain more than 78 million art, technological and cultural history objects, and natural history specimens. The responsibility involves the acquisition, documentation and conservation of these materials along with detailed record keeping or cataloguing, regular inventorying, and storage in secure and atmospherically controlled environments. Objects and collections are loaned regularly to other institutions to assist students, scientists, and scholars.
- Basic research: Increase of knowledge is accomplished through basic research. As an independent Federal establishment, the Smithsonian conducts a broad range of scientific and scholarly research, often in cooperation with other institutions, universities and government agencies. As a result of basic scientific research, fundamental data are assembled and published for use by planners and researchers in other organizations, both government and private. Historical research, through studies in technological development, art, cultural history, biography and folklife traditions, contributes to the knowledge about our heritage and about the nation's growth and development.
- Exhibitions, including performances and festivals or celebrations: These presentations constitute one means of diffusing knowledge on a wide scale. In Washington and New York, Smithsonian museums, galleries, and the Zoological Park, which are visited by approximately 27 million people annually, devote exhibit space to showing significant objects, specimens, and animals from the permanent collections. In addition, temporary exhibitions with loan materials enhance these presentations, adding fresh concepts and ideas which further enrich visitor experiences. Through the Smithsonian Institution Traveling Exhibition Service, some 140 exhibitions are seen annually by more than five million visitors in nearly 700 institutions across the country. Live performances, festivals, celebrations, lectures and

records are also enjoyed by millions of people in the Smithsonian museums as well as in institutions elsewhere and in private homes throughout the nation. Such programs are produced by the Division of Performing Arts, the National and Resident Associates Programs, the Folklife Unit and by the individual museums.

- Education and Public Orientation: Perhaps the most important means of diffusing knowledge is through the education programs of the Institution. These programs offer enormous variety in content and form; they range from in-depth, scholarly symposia to activities for fun and enjoyment, and reach all ages from young children to senior citizens. They include classes and workshops, guided tours by trained docents and radio, television, and motion picture programs, sponsored by the individual museums and by centralized offices including Fellowships and Grants, Symposia and Seminars, and Elementary and Secondary Education. A highly significant aspect of the education effort involves production each year of several hundred publications including museum catalogues, books, scholarly monographs, articles, papers, the Archives of American Art Journal, and Smithsonian magazine, which is now received by approximately 1.8 million Resident and National Associates. At any given time, there are likely to be two to three hundred visiting scholars, scientists and students working throughout the Institution in various collections, laboratories, and offices. The Smithsonian News Service now reaches an estimated 63 million readers of some 900 newspapers across the country. Art to Zoo, a publication for elementary and secondary school teachers is sent to 12,000 schools in all states. Finally, as another educational endeavor, the Institution's Office of Museum Programs offers assistance to museums across the country and abroad by conducting museum training courses, producing and distributing audio-visual programs on conservation principles and techniques, and by awarding grants for professional museum training and research.
- Collections acquisition: The Smithsonian museums acquire works of art, artifacts, and specimens and other objects in three ways: by collecting, by donation and by purchase. Collecting and donation are and will continue to be the major means for acquiring material for the collections. However, donations and even collecting for the most part, may not be the result of planned development. If the National Collections are to be fully representative, and if the Institution's research and exhibition programs are to thrive, the collections must grow by thoughtful design. To meet this responsibility and challenge, the Smithsonian seeks to provide special acquisitions funds for the museums by setting aside an amount of \$1 million annually (since FY 1978) of its nonappropriated Trust funds for purchases of objects of great importance to the collections and by requesting appropriated funds for regular and planned, but relatively less expensive purchases. Because of the enormous increase in the price of major works of art and of rare objects and collections of objects, the Institution is proposing to establish, in FY 1982, an appropriated fund of \$10 million for major purchases of unparalleled significance.

In order to carry out these functions, certain services, including facilities management, protection services and administration provide the required support. The Smithsonian has the responsibility for the maintenance, operation and protection of a large complex of buildings and other facilities centered and located mostly in Washington, D.C., but with important components elsewhere. The Institution also provides architectural and engineering services for major repairs, alterations, and improvements to the physical plant.

The Smithsonian complex presently consists of 11 exhibition buildings in Washington, D.C. and New York City in the fields of science, history, technology, and art; a zoological park and an animal conservation and research center at Front Royal, Virginia; the Anacostia Neighborhood Museum, which performs research and exhibit activities in a low income area of the city in cooperation with the community; a preservation, storage, and air and spacecraft display facility at Suitland, Maryland; a conference center at Elkridge, Maryland; two natural preserves, in the Republic of Panama and on the Chesapeake Bay; an oceanographic research facility in Fort Pierce, Florida; astrophysical centers in Cambridge, Massachusetts, Mt. Hopkins, Arizona, and elsewhere; and supporting administrative, laboratory and storage areas.

Current Method of Accomplishing Work:

A cooperative decentralization characterizes the structure and operation of the Smithsonian's museums and research bureaus. The research, collections management, exhibition, education and collections acquisition efforts are conducted largely by individual museums, galleries, the Zoo and laboratories. Education, exhibit and custodial staff, formerly located centrally, now are placed within the museums in accord with a policy that gives responsibility to directors for the management of their own programs and buildings. The role of the offices of the assistant secretaries is to provide guidance and oversight to the various museums and programs within their areas of responsibility. Other specialized administrative and support units are managed centrally in order to promote efficiency and cost effectiveness. These include such components as budget, accounting, personnel, equal employment opportunity, design and construction, printing and photographic services, supply, and protection services.

Alternatives:

The major alternative to the overall Smithsonian policy of cooperative decentralization would be recentralization of the major programmatic activities. Having previously operated under this policy, the Smithsonian staff knows it would mean loss of the flexibility and creativity essential to provide successfully the wide range of services the Institution offers.

In the administrative and support areas, an alternative approach to making greater use of outside professional and technical services has been rejected as a general overall policy because the present system works well. Other approaches have been found to result in loss of control over functions, increased costs, or inconsistent conduct of operations throughout the Smithsonian. However, the Institution is proposing in this budget further use of outside services, such as those for architectural engineering and design and data processing, when such use will promote efficiency in terms of work accomplishment and cost, and will hold down the requirements for additional staff.

For exhibitions and performances, there may be several alternatives to substantial additional Federal funding for major new exhibitions. First, the Institution, as inflation grows, could mount increasingly smaller and less comprehensive shows, using available base funds. Or, the Institution could mount fewer and fewer exhibitions. Either alternative would serve to lessen the vitality of the museums, reduce research and educational endeavors and resulting publications, and decrease professional motivation and morale.

Another alternative would be for the Institution to rely on private, principally corporate fund raising efforts. However, the uncertainty of such outside financing defeats necessary long-range planning for exhibits development.

The only significant alternative open in the performance of Smithsonian research activities is to determine whether to increase or to decrease the range and numbers of programs in which excellence is sought. More grants and contracts could be solicited for support of work conducted at the Smithsonian or more outside scientists might be invited to become involved in special research projects. However, there is always a problem of effective coordination to assure cost effectiveness, lack of duplication, and mutuality among endeavors. The Smithsonian research activities should be related and conducted in such a manner that will not drain resources into unrelated fields or into projects uncoordinated with other Smithsonian aims. It should be emphasized also that the Smithsonian conducts basic research, not applied research which is more typically conducted at mission-oriented agencies. Much of the Smithsonian's scientific research activities foster biological conservation and can be expected to lead to results that are directly applicable to national needs and goals.

Accomplishments:

A selection of specific accomplishments by functional category follows.

Research:

- Two experiments proposed by Smithsonian scientists and colleagues at Harvard University have received final approval from the National Aeronautics and Space Administration for inclusion on Spacelab flights aboard the Space Shuttle missions of the 1980s (three other proposed experiments have received tentative approval and expect final approval shortly). These experiments will involve use of the Lyman-Alpha Coronagraph and a small helium-cooled infrared telescope.
- The Office of Biological Conservation and the Smithsonian Tropical Research Institute participated in a United States inter-agency task force on tropical forests which reported to the President in May 1980. The report of the task force constituted the basis for new directions in United States' policy on the use and preservation of tropical forests which are being depleted at an alarming rate.
- Approximately 70 articles and monographs resulting from zoological research efforts have appeared in journals and other professional publications in the past year, on subjects ranging from inbreeding and juvenile mortality in captive animals to a genetic basis for disorders detected in Golden Lion Tamarins and Maned Wolves.
- The Multiple Mirror Telescope began a schedule of scientific observations during its first year of operation. In one research program, astronomers discovered an exceedingly hot, rapidly pulsating star which is exhausting its fuel supply very quickly. The star is, consequently, "aging" at an unusually fast rate and scientists expect to see physical changes within a few years, compared to the typical astronomical time scales measured in millions and billions of years.

- Research conducted during FY 1980 by staff, fellows and visiting investigators of the Smithsonian Tropical Research Institute on a wide variety of zoological, botanical, and anthropological subjects has resulted in approximately 125 publications, articles and books. The Institute is the nation's leading biological research center for advanced tropical studies.
- The most important publication ever produced by the Archives of American Art, Arts in America: A Bibliography was published this fiscal year. The four volume work has received wide acclaim as one of the finest reference books on the arts to appear in recent times and was nominated for the American Book Award in the General Reference Category.
- A series of scholarly films/monographs in the area of folklife studies was established with the release of two films: "The Meaders Family: North Georgia Potters" and "The Drummaker," a study of making a ritual Chippewa drum. Accompanying monographs are being prepared for publication by the Folklife Program.
- Outstanding progress was made in making transfer negatives and prints from the disintegrating Juley negatives as well as advancing a project to index American art exhibition catalogues through 1876 and continuing to build the Inventory of American Paintings before 1914. These resources combine with others in the National Collection of Fine Arts to make up a major center for scholarship in American art history.
- The microfiche edition of the Charles Willson Peale Papers was published by the National Portrait Gallery and work continued on the first of eight projected letterpress volumes to be published complete with annotations and explanatory references in 1981.
- Among other major publications resulting from research in history and art are: "Robert Edge Pine: Colonial Portrait Painter," by Robert G. Stewart, which accompanied an exhibition of the artist's work; and the fourth volume of The Papers of Joseph Henry which documents Henry's life from 1838 through 1840.

Exhibitions and Performances:

- The National Air and Space Museum opened a new planetarium show, "New Eyes on the Universe," which describes new methods of exploring the universe and illustrates the latest cosmic discoveries made by new technologies such as orbiting electronic instruments and the world's most advanced earth-bound observatory, the Smithsonian's Multiple Mirror Telescope located at Mt. Hopkins, Arizona.
- The Division of Performing Arts hosted a colloquium marking the twentieth anniversary of the Greensboro sit-in, one of the first actions of the civil rights movement. The theme of the meeting was the role of song and music in the struggle for civil rights and included an exhibition at the Museum of History and Technology, public performances by the song leaders of the movement, the production of a record, photographic catalogue and a recorded symposia by participants of the Greensboro sit-in.

- An exciting new exhibition will open shortly at the National Museum of Natural History featuring a coral reef as a living ecosystem. This exhibit/research project is a living reef in microcosm. Well over one hundred species of animals and plants live in harmony in the exhibit, and are mutually self-sustaining except for the addition of energy in the form of waves and light. The tank containing the coral reef will be used not only as an exhibition of great interest, but also as a research tool for the study of interactions between reef organisms. This new exhibition will serve as a prototypical model for other similar exhibitions elsewhere in the United States.
- A very special exhibition, "A Decade of Discovery: Selected Acquisitions, 1970-1980," opened at the Freer Gallery of Art. The 114 works included spanned 21 centuries--from Chinese and Japanese pottery of the 2nd and 3rd millennia B.C. to the refined lacquer and paintings of the 19th century. A fully illustrated catalogue accompanied the exhibition and presented a number of research finds for the first time, as well as listed all donors to the Freer in the last decade.
- Major exhibitions at the Hirshhorn Museum and Sculpture Garden included two internationally important artists, Joan Miro and Fernando Botero.
- In addition to two major exhibitions on Robert Edge Pine and "American Portrait Drawings," the National Portrait Gallery produced a number of smaller shows including "Waiting for the Hour" (Lincoln and the Emancipation Proclamation), "The Great Crash," "Zelda and Scott: The Beautiful and Damned," and "If Elected...Unsuccessful Candidates for the Presidency, 1912-1976."
- From a year of exceptional exhibitions at the National Collection of Fine Arts, one theme emerges with clarity and accomplishment--the role of the United States government in supporting the visual arts. Three major exhibitions, each with a documented publication, dealt with the relationship of government and art over the past fifty years: "After the Crash," "Sculpture and the Federal Triangle," and "Across the Nation: Fine Art for Federal Buildings, 1972-1979."
- In a cooperative venture, the National Museum of History and Technology and Folklife Programs worked together on an exhibition entitled "The Afro-American Tradition in Decorative Arts." The Museum researched and selected the objects and prepared the exhibition. Folklife Programs arranged for a living component within the exhibition. Featured in live demonstration were a mother and daughter from South Carolina who carry on a two-hundred-year-old African tradition of making coil baskets from sweet grass, pine needles and palmetto.

Collections Management:

- Inventory work at the National Museums of Natural History, History and Technology, and the Cooper-Hewitt Museum are proceeding on schedule with approximately 3.5 million inventory records representing 13.25 million objects produced to date. In the Museum of Natural History, progress on inventories is excellent. An inventory of the anthropology collection, one of the first to be moved to the Museum Support Center, is nearing completion.

- Computerization of collection data began at the National Portrait Gallery with the Time cover collection (850 objects), which was completed, and work is now proceeding with the permanent and study collections.
- Substantial progress was made toward upgrading facilities at Silver Hill for secure and environmentally sound collections storage for the National Museum of History and Technology. The Museum also developed plans for adequate conservation space and facilities.
- The paper conservation laboratory and the textile study center both opened at the Cooper-Hewitt Museum. In addition, progress continues to be made in the development of proper storage space for all of the collections, with focus now on the decorative arts.
- Some 185 collections of papers were microfilmed resulting in 492 master rolls of film added to the Archives of American Art. In addition, 5,500 new catalogue cards were produced and distributed.

Education and Public Orientation:

- The Mt. Hopkins Observatory began a new public service program of monthly "Observatory Nights" in which science staff members present free popular lectures and opportunities for telescopic observations are made available to visitors.
- In conjunction with the University of Panama, the Office of Conservation of the Smithsonian Tropical Research Institute has produced three audio-visual presentations designed to inform Panamanians of the value of national parks, the natural history of Panama and the conservation and research activities of the Institute.
- The Anacostia Neighborhood Museum Black Heritage Puppets made its debut during Black History Month with an exciting interpretative program based on information extracted from the "Out of Africa" exhibition. As an outgrowth of the Museum's outreach program, the puppet theatre is expected to enable the Anacostia Neighborhood Museum to serve a significantly larger number of secondary students and teachers.
- Cooper-Hewitt Museum continued its series of collections handbooks adding editions on glass, tiles, sword guards, furniture and wallpaper. In addition, the Museum instituted education programs for the hearing impaired and is developing ideas for the visually impaired.
- A museum records seminar for professionals from across the country was organized by the Archives of American Art. The purpose was to discuss building archives in art museums. As a result of the seminar, the Archives published "Guidelines for Museum Archives" which is currently being distributed.
- At the Hirshhorn Museum and Sculpture Garden, the first phase of renovating the garden for the physically disabled was completed.

- Considerable progress was made at the Freer Gallery of Art in improving public gallery spaces, including painting, carpeting and the provision of comfortable seating. The Gallery is also working on updating general room lighting and incorporating innovative exhibits lighting to increase visibility and reduce energy requirements.

Collections Acquisition:

- The holdings of the Archives of American Art have been increased by some 350 collections including the papers of Gertrude Vanderbilt Whitney, a sculptor and art patron, and A. Hyatt Mayer, curator and scholar. In addition, 30 oral history interviews were conducted and four audio-visual interviews of Louise Nevelson, Isamu Noguchi, Marcia Tucker and Barbara Rose were accomplished.
- One of the most important purchases made this year with Federal acquisitions funds by the Hirshhorn Museum and Sculpture Garden is a major Tony Smith sculpture. The work, in aluminum, is entitled "Throwback." It is currently exhibited on the Museum plaza.
- At the National Portrait Gallery, major purchases made with Federal funds include paintings of Commodore William Bainbridge by Rembrandt Peale, George Washington by Robert Edge Pine, and Colonial Massachusetts Governor William Shirley by Thomas Hudson. Important prints and photographs include an exceedingly rare mezzotint of Anthony Wayne and daguerreotypes of Chester A. Arthur, Frederick Douglass and Harriet Beecher Stowe.
- Federal funds enabled the National Collection of Fine Arts to make a number of important purchases including a painting by Emanuel Leutze entitled "The Courtship of Anne Boleyn," a painting by Worthington Whittredge, "The Amphitheatre of Tusculum and View of the Alban Hills" and two miniatures of Mr. and Mrs. John Corlis by Edward Greene Malbone.
- Among objects purchased by the National Museum of History and Technology with Federal acquisitions funds are a gown belonging to Dolly Madison and a bust of George Washington made of redware pottery by an American potter and dated 1850. Other objects include a slave bill which was executed by an agent of George Washington for the sale of three slaves in the State of Pennsylvania, a Twombly cycle car, an English-style riding saddle made in 1829 by an American and carrying its original labels and an 18th century pitch-pipe in the shape of a book. Gifts to the Museum include two important collections - the C. Bremner Jackson Collection of American and European military weapons and uniforms dating from the early eighteenth century to the present and the Burch Collection of medical equipment.
- The National Museum of Natural History acquired by gift several collections of mollusks from various world locations and over 56,000 crustaceans from Tunisia.

Facilities Management, Protection Services, and Administration:

- The five-year projection process continued successfully with the approval by the Board of Regents of the Five-Year Prospectus FY 1981 - FY 1985.

- Effective collaboration between the Budget, Treasurer's, and Accounting Offices led to further improvements in the comprehensiveness, accuracy, and consistency of various budget and financial reports for internal use as well as for the Office of Management and Budget and the Congress.
- Substantial progress was made in implementing the Civil Service Reform Act of 1978 with the greatest effort devoted to performance appraisal and merit pay and the strengthening of recruitment and hiring of women, minorities, and disabled persons. New affirmative action plans were developed and implemented with emphasis on categories of employment that were statistically indicated to be underrepresented. Programs of cooperative education and upward mobility were established and augmented respectively.
- Computer services included the implementation of an on-line animal food management system for the Zoo, continued assistance with the Institution's collections inventory, work on a system to aid in the booking and monitoring of traveling exhibits, analysis and programming in connection with buildings' security, and many other projects in support of research, collections management, and public education.
- New procurement guidelines for the auxiliary activities established a clearer role for the Office of Supply Services and that office installed word processing and computer systems for the preparation and monitoring of procurement and contracting documents.
- Progress was made in correcting nitrate film problems and in establishing a catalogue of photographic materials.
- An extensive energy conservation program was established with resulting important cost avoidance.
- Improvements were made in the Institution's health services program.
- Substantial progress was made on the development of the Museum Support Center and the Quadrangle projects and a wide range of building restoration, renovation, repair, and improvement projects were completed.

MINIMUM LEVEL DECISION PACKAGE 1000-1
Smithsonian Institution
 Salaries and Expenses: 33-0100-0-1-503

Activity description: Resources included in this level represent approximately 90 percent of the FY 1981 estimated appropriation. All existing programs would be maintained, although the total reduction of \$10.4 million from the FY 1981 estimate would have the effect of appreciably limiting the scope and effectiveness as well as eliminating some parts of Smithsonian programs.

<u>Resource requirements</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This Package</u>	<u>Cumulative Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	-10,448	108,390	108,390	108,390	108,390	108,390
Outlays (\$000)	106,987	117,759	-8,516	109,243	108,467	108,397	108,391	108,390
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	-327	3,033				
Total	3,735	3,760	-380	3,380				

Short-term objectives:

- Maintain the Institution's major programs, although at considerably reduced levels.
- Emphasize collections management and the facilities management, protection services and administration functions, by compensating with larger reductions to other functions.

Impact on major objectives:

The reductions to reach the minimum level are described in terms of the functional categories noted in the Decision Unit Overview. As detailed in the functional distribution of resources chart at the end of this section, two functions--collections management, and facilities management, protection services, and administration--are emphasized at this level in that they would retain more than 90 percent of the FY 1981 estimated funding: 92.4 percent for collections management and 91.8 percent for facilities management, protection services, and administration. This is less than the average percentage reduction and is indicative of the continued high priority of caring for and documenting the National Collections, of providing adequate security and buildings maintenance, and of sustaining planned programs of improvement in the administrative areas.

The research function would retain 87.9 percent of its FY 1981 estimate, and the education and public orientation function would have 87.7 percent; the exhibitions and performances function, 86.8 percent; and the collections acquisition function, 71.7 percent. The other national services function which consists of only two programs would retain 90.1 percent of its FY 1981 estimate.

In terms of overall dollars, each functional category would receive the following funding at the minimum level compared with the current level: research, \$18.372 million, a reduction of \$2.537 million; collections acquisition, \$.664 million, a reduction of \$.262 million; collections management, \$15.942 million, a reduction of \$1.310 million; exhibitions and performances, \$9.879 million, a reduction of \$1.497 million; education and public orientation, \$3.738 million, a reduction of \$.524 million; other national services, \$.941 million, a reduction of \$.103 million; and facilities management, protection services, and administration, \$58.854 million, a reduction of \$4.215 million.

Distribution of Resources by Functional Category

<u>Functional Category</u>	<u>FY 1981 Estimated Appropriation</u>		<u>At Minimum Level</u>		<u>Reduction from FY 1981 (Est.)</u>		<u>Minimum Level Percentage of FY 1981 (Est.)</u>	
	<u>FTP</u>		<u>FTP</u>		<u>FTP</u>		<u>FTP</u>	
	<u>Pos</u>	<u>\$000</u>	<u>Pos</u>	<u>\$000</u>	<u>Pos</u>	<u>\$000</u>	<u>Pos</u>	<u>\$000</u>
Research	513	20,909	448	18,372	-65	-2,537	87.3	87.9
Collections Acquisition	-	926	-	664	-	-262	-	71.7
Collections Management	547	17,252	503	15,942	-44	-1,310	92.0	92.4
Exhibitions & Performances	281	11,376	254	9,879	-27	-1,497	90.4	86.8
Education & Public Orientation	140	4,262	129	3,738	-11	-524	92.1	87.7
Other National Services	8	1,044	7	941	-1	-103	87.5	90.1
Facilities Management, Protection Services & Administration	1,871	63,069	1,692	58,854	-179	-4,215	90.4	91.8 ^{/1}
Total	3,360	118,838	3,033	108,390	-327	-10,448	90.3	90.2 ^{/1}

^{/1} Computations based on FY 1981 level less utilities and rent base of \$11.935 million.

Other information:

The impact of these reductions would be extremely severe on virtually all programs of the Institution. The following gives examples of activities that would be curtailed:

Original scientific research would be cut back by reducing the level of technical staff support and equipment available to scientists and thereby decreasing the efficiency and productivity of professional staff, especially at the National Museum of Natural History, the Smithsonian Astrophysical Observatory, the Radiation Biology Laboratory, and the Smithsonian Tropical Research Institute. A reduction of staff scientists would be required in virtually all science units resulting in the elimination or delays of several important current projects. For example:

- The Smithsonian Astrophysical Observatory would eliminate six positions in the physicist, geologist, and astronomer categories and at least six important studies would have to be cancelled. The Smithsonian Astrophysical Observatory also would delay the development of new instruments and detectors for the Multiple Mirror Telescope.
- The Chesapeake Bay Center for Environmental Studies would abandon the land use history program for the area occupied by and immediately adjacent to the facility which would limit the applicability of its research effort.
- The Smithsonian Oceanographic Sorting Center would eliminate its algae section which is a major activity of the Center.
- The National Zoological Park would be required to cut back the quality of medical aid and curtail ongoing research in animal pathology.
- The National Air and Space Museum would reduce its curatorial staff by four positions; thereby limiting research opportunities and publications.

Original historical research would be reduced as a result of cuts to the research staffs and resources available for research support. For example:

- The National Museum of History and Technology would eliminate one senior historian and nine specialized curators from several divisions. This would have a serious impact on original research which would also effect the quality of exhibitions, and the ability of the Museum to respond to public demand for information, loans, and access to the National Collections.
- The National Collection of Fine Arts would suspend efforts on its compilation of the Smithsonian Institution Art Index which would jeopardize the entire project.
- The Joseph Henry Papers project would eliminate one research assistant which would cause delays in publication of the scheduled manuscripts of Joseph Henry, the pioneer American physicist and

first Secretary of the Smithsonian.

Collections management efforts also would be curtailed resulting in delays in collections inventory work, and serious disruption to conservation efforts. For example:

- The National Museum of Natural History would reduce its staff of inventory technicians as well as support areas including data processing.
- The National Zoological Park would reduce its animal keeper staff, thus jeopardizing the quality of the care provided to the animals.
- The National Museum of History and Technology would curtail purchases of much needed storage equipment essential for proper care of the collections.
- The Cooper-Hewitt Museum would eliminate an important paper conservator position.
- Conservation programs of the Conservation Analytical Laboratory, Freer Gallery of Art and Hirshhorn Museum and Sculpture Garden would be curtailed.
- The Conservation Analytical Laboratory would discontinue the publication of the annual Smithsonian Archeometry series. The annual series includes papers which are delivered at seminars cosponsored with the National Bureau of Standards, which are of national and international interest and importance to the conservation profession.

Federal acquisition funds, used mainly for the purchase of works of art and objects of historical significance, would be reduced. A cut to the Federal resources for acquisitions would jeopardize our objectives of maintaining the highest standards for the National Collections, especially given the soaring rate of art prices.

- The Hirshhorn Museum and Sculpture Garden's acquisition program would be severely affected by a reduction in resources. This collection must be kept current since the Museum was established as a repository of contemporary art.
- The Museum of African Art's entire acquisitions base would be eliminated.
- The National Portrait Gallery and the National Museum of History and Technology also would lose resources available for acquisitions.
- The Smithsonian Institution Libraries would be required to curtail book and journal purchases which are essential to support research and exhibitions work throughout the Institution.

Exhibitions and performances would be affected heavily in that major art and science shows would be eliminated and support provided to exhibition programs would be trimmed. For example:

- The National Air and Space Museum would cancel the planned new major gallery "Homebuilts".
- The National Museum of Natural History would be limited to one major exhibition per year at a time when revitalization of the exhibitions program is a high priority of the Museum.
- The National Portrait Gallery would defer the planned major exhibition, "American Portraiture in the Grand Manner", as well as two smaller exhibitions.
- The Museum of African Art would eliminate museum information brochures that accompany its annual major exhibitions.
- The National Collection of Fine Arts and the Hirshhorn Museum and Sculpture Garden would eliminate several exhibitions.
- The National Museum of History and Technology would reduce base support funds allocated to the major exhibition on George Washington, thus jeopardizing the quality and scope of the exhibition or causing its deferral.
- Resources used in support of exhibitions throughout the Institution would be reduced, seriously affecting the quality of our exhibitions. Specifically, programs of the Office of Exhibits Central, Horticulture, and Plant Services, which provide key fabrication, installation and interior design support for exhibitions, would be cut back.

Education and public orientation programs of several museums and organizations, particularly at the National Museum of Natural History, the National Air and Space Museum, the Smithsonian Tropical Research Institute, the National Collection of Fine Arts, the National Portrait Gallery, the Hirshhorn Museum and Sculpture Garden, and the Office of Elementary and Secondary Education would be curtailed. These programs are designed primarily for school children and educators.

In the facilities management, protection services and administration function, reductions in the core staff in most administrative units and in the guard force would be necessary, interrupting phased programs of planned improvements. Moreover, other support services, including the custodial maintenance of the public areas of the museum buildings, would be strained severely.

In the other national services function, it would be necessary to reduce the number of grants made under the auspices of the National Museum Act. In addition, the already inadequate base funds available to reimburse the Government Printing Office for its handling of the international exchange of government publications (pending the enactment of legislation which will transfer the responsibility for this function to the Government Printing Office) would be reduced.

Basis for the minimum level:

Given the wide and varied scope of Smithsonian activities and public service responsibilities, the Institution's managers determined that reductions would be applied in a balanced manner throughout the Institution. With an estimated appropriation of \$118.8 million in FY 1981, approximately 70 percent of which covers personnel compensation and benefits, it was considered impossible to propose more than a ten percent cut overall. Accordingly, each bureau or office that receives an allotment of funds was required to propose a reduction of at least ten percent of its total budget and to determine how the cut would be applied among its functional categories. A reduction below the current level would result in short and long-term inefficiencies, would require an extensive reduction-in-force since it is unlikely that attrition would result in a sufficiently large and balanced decline in employment, and would interrupt phased programs of planned improvements.

Redirection of base level resources:

As was the case in the prior three years, the minimum level package was derived from a thorough program analysis to determine: a) whether the program had fulfilled its purpose; b) whether the program was desirable and effective; and c) whether the resources level applied to each program was too high or too low. This review revealed that \$.6 million of high priorities of the Institution in the areas of research, collections management, and administration could be funded with base resources at the current level in FY 1982 from programs of lower priority. This follows similar analyses for the FY 1979 - 1981 budgets which have resulted in redirections of \$2.6 million from lower to higher priorities. Total redirections of base resources over the four year period FY 1979 - 1982 therefore would total \$3.2 million.

INTERMEDIATE LEVEL DECISION PACKAGE 1000-2

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Resources included in this level represent approximately 96 percent of the FY 1981 estimated appropriation. While only two functional categories would receive more than 96 percent of current level funding, there are no significant variations among the functions. The emphasis here is on maintaining a relative balance in all program areas which would be reduced, in total, by an amount of \$3.9 million below FY 1981 estimated level.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	107,764	118,838	6,555	114,945	114,945	114,945	114,945	114,945
Outlays (\$000)	106,987	117,759	5,958	115,201	114,969	114,947	114,945	114,945
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	210	3,243				
Total	3,735	3,760	240	3,620				

Short-term objectives:

- Maintain the existence of major programs, although at a reduced level.
- Emphasize the collections management and the facilities management, protection services and administration functions by giving these functions the largest percentage of current level funding.

Impact on major objectives:

As detailed on the "Distribution of Resources by Functional Category" chart at the end of this section, the collections management and facilities management, protection services, and administration functions, which retain the largest percentage of resources among the various functions at the minimum level, also receive the largest percentage at this level. Each of these functions would retain approximately 97 percent of its FY 1981 estimated funding. The research, education and public orientation, and collections acquisition functions each would retain approximately 95 percent of its FY 1981 estimated funding; and the exhibitions

and performances function would retain 94 percent. Other national services, which consists of only two programs, would hold 96 percent of its funding.

The functional categories would receive the following funding at the intermediate compared with the FY 1981 estimated level: research, \$19.973 million, a reduction of \$.936 million; collections acquisition, \$.877 million, a reduction of \$.049 million; collections management, \$16.718 million, a reduction of \$.534 million; exhibitions and performances, \$10.746 million, a reduction of \$.630 million; education and public orientation, \$4.039 million, a reduction of \$.223 million; other national services, \$1.003 million, a reduction of \$.041 million; and facilities management, protection services, and administration, \$61.589 million, a reduction of \$1.480 million.

Distribution of Resources by Functional Category

Functional Category	FY 1981 (Est.) Appropriation		Intermediate Level		Reduction from FY 1981 (Est.)		Intermediate Level Percentage of FY 1981 (Est.)	
	FTP		FTP		FTP		FTP	
	Pos	\$000	Pos	\$000	Pos	\$000	Pos	\$000
Research	513	20,909	492	19,973	21	936	95.9	95.5
Collections Acquisition	-	926	-	877	-	49	-	94.7
Collections Management	547	17,252	533	16,718	14	534	97.4	96.9
Exhibitions & Performances	281	11,376	268	10,746	13	630	95.4	94.4
Education & Public Orientation	140	4,262	134	4,039	6	223	95.7	94.8
Other National Services	8	1,044	8	1,003	-	41	100.0	96.1
Facilities Management, Protection Services & Administration	1,871	63,069	1,808	61,589	63	1,480	96.6	97.1 ^{/1}
Total	3,360	118,838	3,243	114,945	117	3,893	96.6	96.4 ^{/1}

^{/1} Computations based on FY 1981 level less utilities and rent base of \$11.935 million.

Other information:

The impact of reductions required to reach the intermediate level would be considerable. In general:

- Original scientific and historical research would be cut back through reductions in the number of researchers and in technical support for research.
- Collections management programs of registration and conservation would be curtailed.

- The quality and diversity of the Institution's exhibition programs would be reduced in that major art and science exhibitions would be limited in scope; planned refurbishment of exhibit halls would be deferred; and production support for exhibitions would be curtailed.
- Education programs in several museums and bureaus would be curtailed through cutbacks in staff and supplies and through reduction in the number of workshops, educational brochures, and other publications produced.
- In the facilities management, protection services and administration function, reductions in the core staff in most administrative units and in the guard force would be necessary, interrupting phased programs of planned improvements in these areas. Moreover, other support services, including the maintenance of the public areas of the museum buildings, would be reduced.
- For other national services, it would be necessary to reduce grants made under the auspices of the National Museum Act, and to reduce the already inadequate base funding available to reimburse the Government Printing Office for the international exchange of government publications.

CURRENT LEVEL DECISION PACKAGE 1000-3
Smithsonian Institution
Salaries and Expenses: 33-0100-0-1-503

Activity description: The resources included in this package would enable the Smithsonian to continue, (except for reductions caused by inflation) at the FY 1981 resource level, programs of research, collections management, collections acquisition, exhibitions and performances, education and public orientation, other national services and facilities management, protection services, and administration. All funds cut to reach the minimum level are restored here.

Resources of \$.6 million are redirected at the current level from lower to higher priority programs in order to cover important needs prior to seeking additional resources. Some of these redirections involve shifts of resources within a single functional category; others involve changes across functional category lines. (From FY 1979 - FY 1981, a total of \$2.6 million of base resources were redirected in a similar way.) The programs to which funds are redirected in FY 1982 include:

- Research - by providing additional staff to the National Air and Space Museum in order to begin to document the historical aspects of technological achievements in aeronautical and space science, and by promoting research efforts at the National Museum of History and Technology through increased publications funds.
- Collections Management - by establishing an archives facility at the National Museum of History and Technology that will assure the proper organization and supervision of documents, photographs, and other two dimensional resources now dispersed throughout the Museum; and by funding, in part, a program by the Smithsonian Institution Libraries designed to deacidify library materials to prevent deterioration; and by increasing the books and journals budget of the Libraries.
- Collections Acquisition - by increasing the acquisitions funds available to the National Portrait Gallery.
- Facilities Management, Protection Services and Administration - by providing funds for the Office of Equal Opportunity to offer exhibits and other presentations at national conferences in order to strengthen efforts to recruit minorities and women and to engage in other outreach work, including career orientations at area high schools and advertisements about Smithsonian career opportunities in minority and women's publications; and by increasing the number of mechanical systems operators, at the National Zoological Park, in order to assure that the increased number of aquatic filtration units in operation at such exhibits as Beaver Valley and Aquatic Habitats are maintained adequately.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	107,764	118,838	3,893	118,838	118,838	118,838	118,838	118,838
Outlays (\$000)	106,987	117,759	3,539	118,740	118,829	118,837	118,838	118,838
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	117	3,360				
Total	3,735	3,760	140	3,760				

Short-term objectives:

- Restore funds, which were cut to reach the intermediate level, that are critical to the maintenance and support of existing programs.
- Emphasize the collections management, research, collections acquisition, and facilities management and administrative functions by reallocating \$.6 million of base resources to or within these functions in order to meet significant needs.

Impact on major objectives:

This package assumes that the current level of operation can be sustained only if FY 1981 economic conditions were to prevail during FY 1982. The realities of the economy do not support this assumption; therefore, funding at this level would mean, in effect, that the Institution's major objectives could not be met at the level anticipated in FY 1981.

Distribution of Resources by Functional Category:

Compared with projected allocations for FY 1981, resources proposed at the current level would be applied as follows by functional category:

Functional Category:	FY 1981 (Estimated)		At Current Level	
	FTP Pos	\$000	FTP Pos	\$000
Research	513	20,909	513	20,853
Collections Acquisition	-	926	-	961
Collections Management	547	17,252	552	17,376
Exhibitions and Performances	281	11,376	275	11,276
Education and Public Orientation	140	4,262	140	4,263
Other National Services	8	1,044	8	1,044
Facilities Management, Protection Services and Administration	1,871	63,069	1,872	63,065
Total	3,360	118,838	3,360	118,838

CURRENT SERVICES LEVEL DECISION PACKAGE 1000-4

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: A total of \$3.660 million is requested for: 1) uncontrollable pay-related items including anticipated within-grade increases scheduled during FY 1982 (\$1.084 million); the annualization of the General Schedule and Wage Pay increases anticipated for October 1981 for Washington based employees and at other times during the year for Smithsonian employees in other geographic areas (\$199 thousand); and Merit Pay for supervisors and management officials (\$217 thousand); 2) projected cost increases for rent (\$260 thousand) and communications and utilities (\$1.9 million).

	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Resource requirements:								
Budget Authority (\$000)	107,764	118,838	3,660	122,498	125,342	128,558	132,084	135,872
Outlays (\$000)	106,987	117,759	3,327	122,067	125,044	128,238	131,734	135,495
Necessary Pay:								
--Within-grade increases			1,084					
--Annualization of								
pay raises			199					
--Merit Pay			217					
Utilities			1,900					
Rent			260					

Short-term objectives:

- To meet additional, uncontrollable pay-related costs.
- To cover higher rent, communications and utilities costs anticipated in FY 1982.

Impact on major objectives:

In view of the "uncontrollable" nature of the components of this decision package, the requested resources are essential to allow the continuation of current level programs and functions. Should this request not be approved, in full or in part, Smithsonian bureaus and offices would be compelled to absorb these costs. Planned programs, therefore, would have to be reduced accordingly.

Other information:

1. Within-grade and Merit Pay increases and annualization of FY 1981 pay increases

These anticipated increases were calculated by a position-by-position analysis based on proposed positions for FY 1981. Further, the Merit Pay requirements were calculated following guidelines issued by the Office of Personnel Management (OPM). The amount requested for Merit Pay replaces the amount for within-grade increases that would have been paid to Merit Pay employees under the conventional step system, and the amount for quality step increases that OPM estimates would have been paid to Merit Pay employees. Funding for the Merit Pay portion of the annual comparability adjustment will be included in the Smithsonian's FY 1982 pay supplemental request.

2. Rent, Communications and Utilities

The rent, communications and utilities accounts include the following components: electricity, steam, gas, fuel oil, water, telephone and postage. Additionally, the Federal share of rental space costs of the administrative activities located at L'Enfant Plaza, at the Smithsonian Institution Service Center at 1111 North Capitol Street and at the Smithsonian Oceanographic Sorting Center are covered by this account.

The following table depicts actual and anticipated use and cost of the major components of the utilities account between FY 1980 and FY 1982 and summarizes the projected base shortage in each component between the estimated FY 1981 appropriation and the estimated costs for FY 1982.

FY 1979 - FY 1982 Utilities

Fiscal Year	Electricity			Steam			Gas		
	Use	Unit Cost	Cost	Use	Unit Cost	Cost	Use	Unit Cost	Cost
	Millions of KWH	Average Per KWH	\$000s	Millions of lbs.	Average Per 1,000 lbs.	\$000s	Millions of Cu. Ft.	Average Per Cu. Ft.	\$000s
1979 Actual	90.4	.0431	3,897	269.6	8.90	2,400	.956	.3149	301
1980 Est. Actual	86.0	.0465	4,000	227.6	11.23	2,557	.924	.3788	350
1981 Est.	86.0	.0628	5,400	270.0	13.50	3,645	.956	.4184	400
1982 Est.	86.0	.0706	6,070	270.0	14.00	3,780	.956	.4707	450
1982 Est.			6,070			3,780			450
1981 Base			<u>5,777</u>			<u>2,808</u>			<u>350</u>
	Base Shortage, Electricity		293	Base Shortage, Steam		972	Base Shortage, Gas		100

Additionally, an increase of \$535 thousand is needed to cover projected increased costs of fuel oil and water (\$75 thousand), mail (\$185 thousand), and telephones (\$275 thousand), the latter resulting from anticipated cost increases for operation of the Federal Telecommunications Network Service (FTS) administered by the General Services Administration. The Smithsonian continues to limit telephone costs by routing all service and equipment requests through a central telecommunications office to assure that only essential services and equipment are obtained.

The estimates for FY 1981 and FY 1982 are based on past usage data, historical weather patterns, current and planned use of space in buildings, available information on rates from utility companies, energy conservation goals, and rate increases that have resulted from or are considered likely as a result of the national and international energy situation.

The major component (\$.972 million) of the proposed increase is for steam. Although steam usage for FY 1982 is estimated to approximate actual usage in FY 1979, costs have risen steadily each year. In August 1980 the General Services Administration (GSA) notified the Smithsonian that although FY 1980 steam sales were down by 17 percent from FY 1979 as a result of warmer weather and improved energy conservation measures, users should expect significantly higher steam rates in FY 1981 and FY 1982. The higher steam rates have resulted both from higher costs incurred by GSA for fuel oil, coal and natural gas, which are necessary to generate steam, and GSA's need to recuperate revenue losses resulting from declining sales. Between FY 1980 and FY 1982, the consumption of electricity is projected at a constant level that is 4.9 percent less than in FY 1979, even though the consumption estimates account for new facilities at the National Zoological Park (including the Beaver Valley Complex, the Great Ape House Complex, and the Reptile House) and the addition of the Museum of African Art (acquired August 1979). In FY 1981 and 1982 increased electricity costs are projected due to conversion in May 1980 to a new "time of day" rate structure and anticipated annual rate increases. The "time of day" rate structure imposes a premium charge for consumption between the hours of 12 noon and 8:00 p.m. on weekdays.

Rental Space:

This item consists of the proportionate Federal rental space costs of the administrative activities located at L'Enfant Plaza, the Smithsonian Institution Service Center at 1111 North Capitol Street and the Smithsonian Oceanographic Sorting Center at the Washington Navy Yard. Under the terms of the rental leases, the Smithsonian is required to assume additional costs for operating expenses brought about by sharp increases in maintenance and utilities costs. An amount of \$260 thousand is required to cover higher space rental costs at these locations which are estimated to total \$1.2 million in FY 1982.

Authority will be sought to allow the Institution in FY 1982 to enter into a 10 year lease at the Service Center on North Capitol Street. Without such authority, it is anticipated that the Smithsonian will be subject to higher than normal rental increases, and may be requested by the lessor to vacate this building in 1984.

Energy Conservation Efforts:

In order to manage use of energy in the most efficient manner possible consistent with proper environmental conditions for the collections, the Institution has established a comprehensive energy management program. This program concentrates on promoting systems efficiency and conservation. (Plans to develop efficient utilities systems are addressed in the Construction portion of the budget.) Efforts to promote conservation include operation of a complex computerized power management system which has resulted in substantial energy cost avoidance. This system minimizes costly peak demand rates by cycling motors on and off on a prescheduled basis, and when necessary, selectively shutting down equipment. Monitoring systems have greatly assisted the Institution's conservation efforts by assuring that all installed utilities function efficiently.

Other efforts to achieve more economical and efficient energy use include reduction in lighting levels in work and non-public spaces and, whenever possible, in public areas; operation of heating and air-conditioning systems at minimum levels required to prevent damage to collections; shut-down of fans and other heavy consumers of electricity during non-public hours; establishment of an awards program to reward employees who submit original suggestions that are implemented to save energy; and greater attention to energy conservation in the design of new facilities such as the National Zoological Park's Great Ape Complex currently under construction, which will have a complete solar-powered hot water system.

Although weather, numbers of visitors and new facilities all effect energy consumption, a measure of the success of the Institution's energy conservation efforts can be seen in the fact that consumption of electricity and steam are expected to remain relatively constant between fiscal years 1979-1982 despite the addition of new facilities. Since FY 1978, the Institution has avoided an estimated \$1.5 million in utilities costs as a result of the energy conservation measures outlined above.

CURRENT SERVICES LEVEL DECISION PACKAGE 1000-5

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Inflation. Resources totaling \$1.7 million are requested to help offset the cumulative and anticipated higher costs to the Institution as a result of inflation. The amount requested is calculated on the basis of seven percent of the total nonsalary object classes of expense estimated for FY 1981, excluding utilities and rent. As with other museums and research organizations, inflationary increases represent significant costs that have the cumulative effect of seriously eroding exhibitions, research, collections management, collections acquisition, and education and public orientation programs, as well as facilities management, protection services and administrative services. The result of inflation, therefore, is equivalent to a significant cut each year to the bases of all the Smithsonian's approximately sixty organizational units.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This</u>	<u>Cumulative</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
			<u>Package</u>	<u>Total</u>				
Budget Authority (\$000)	107,764	118,838	1,700	124,198	128,942	134,058	139,584	145,472
Outlays (\$000)	106,987	117,759	1,545	123,612	128,457	133,548	139,035	144,886
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	-	3,360				
Total	3,735	3,760	-	3,760				

Short-term objective:

- To help offset the effects of inflation in the expenses portion of the Salaries and Expenses appropriation.

Impact on major objectives:

- In view of the effects of inflation, the resources requested in this package are essential to fund all Smithsonian activities at the current level. A significant reduction in the quality of Smithsonian programs would result if this request is not approved.

Other information:

Cost increases affecting the Smithsonian's main functional areas continue to have a severe impact on the Institution's ability to carry out its programs as they were intended. One such area is exhibitions. Materials used to mount exhibitions are becoming increasingly costly as illustrated by the following table.

<u>Item</u>	<u>FY 1978</u> <u>Unit Cost</u>	<u>FY 1979</u> <u>Unit Cost</u>	<u>FY 1980</u> <u>Unit Cost</u>	<u>Percentage Increase</u> <u>FY 1978 - FY 1980</u>
Pine - per bd. ft.	\$ 1.65	\$ 2.50	\$ 3.50	112 percent
2x4s - 16 ft.	4.60	6.20	7.25	58 percent
Paint, white latex - 1 gal.	5.15	6.49	8.11	57 percent
Plexiglas - 4'x8' - 1/8"	26.24	33.60	40.00	52 percent
Plywood - 4x8 sheets - 1/2"	13.00	16.77	18.60	43 percent
Drywall - 4x8 sheets - 1/2"	3.25	4.20	4.45	37 percent
Plywood - 4x8 sheets - 3/4"	18.95	22.18	24.61	30 percent
Case of 300 W bulbs	58.00	70.80	114.00	97 percent
Shellac - 1 gal.	11.00	11.86	12.25	11 percent

Efforts are made to lessen the increasing costs of exhibit preparation. These include simplifying the manner of presentation and having the work done by Smithsonian staff whenever possible rather than by outside contractors. Exhibit cases and other structures are modified and reused whenever possible. However, some exhibitions require custom designed pedestals, cases, platforms, and special security all of which contribute to increased costs.

Inflationary cost increases also are evident in research - related expenses, including those for supplies, travel, books and journals, and publishing. The inflation rate for such essential items as books and journals is estimated at 18 percent. Computer equipment maintenance costs have increased 19 percent. Silver nitrate, essential in the carbon dating process, has increased 151 percent in price over a 14 month period as evidenced by the rise in cost from \$363 per 500 grams in May 1979 to \$913 per 500 grams in July 1980. The following chart gives prices of additional items purchased regularly.

Research and Scientific Supplies and Contracts

<u>Item</u>	<u>FY 1976</u>	<u>FY 1979</u>	<u>FY 1980</u>	<u>Percentage Increase (inflation rate) FY 1976 - FY 1980</u>
Kodak film for scanning electron microscope	\$ 8.99	\$ 10.33	\$ 15.60	74 percent
Dry ice, per 1,000 lbs.	47.50	59.00	79.50	67 percent
Electron microscope maintenance/year	2,964.00	3,948.00	4,476.00	51 percent
Deionized water apparatus	--	1,500.00	1,980.00	32 percent
Tektronix 7313 Oscilloscope	--	3,890.00	4,860.00	25 percent
Beckman L5-65 Ultracentrifuge	--	16,200.00	19,370.00	20 percent
Microscopes	Each order varies due to type and accessories; vendors quote 15 percent increase per year.			

Air travel costs have increased dramatically in the past year, mainly due to the price increases of aviation fuel. Travel is necessary for the Institution's basic research programs; it is also essential for work related to the preparation of exhibitions, purchases for the collections, and participation in scholarly seminars and meetings and other educational endeavors. The Smithsonian uses the contract fares developed by GSA whenever possible. The following list of round trip fares illustrates the enormous price increase between June 1979 and July 1980; domestic air fares are expected to continue to increase approximately four percent each month.

Round trip coach air fares from Washington, D.C.

<u>Destination</u>	<u>June 1979</u>	<u>July 1980</u>	<u>Percentage Increase FY 1979 - FY 1980</u>
Los Angeles	\$ 446	\$ 734	65 percent
Boston	130	200	54 percent
Panama	339	510	50 percent
New York	88	120	36 percent
Nepal	2,026	2,500	23 percent
Manus, Brazil	1,000	1,175	18 percent

The cost of books and journals, for which the Smithsonian Institution Libraries projects expenditures of \$495 thousand in FY 1980, has been rising by an estimated 18 percent per year. Since a large quantity of professional literature is purchased from abroad, the declining value of the U.S. dollar exacerbates inflationary pressures. Publication costs, essential to scientific research, as well as to exhibition and educational programs also have been rising steadily. For example, the cost of printing scientific series publications has risen from \$301 thousand in FY 1979 to \$334 thousand in FY 1980 for an equal number of manuscripts, an increase of 11 percent. These publications, the products of research performed by Smithsonian scientists, are disseminated to schools, libraries, and other museums.

Collections management programs are affected by the steady price increases of such items as microfilming and microfilm supplies, shelving, storage cases, and insect drawers and trays. For example, the cost of insect trays has risen by 132 percent over the last four years. The cost of acid-free folders used to prevent the deterioration of paper has increased by 22 percent. Similar dramatic price increases are observed in the purchase of other materials used for archival purposes.

Collections Management Equipment

Polyethylene bags for storing specimens

4"x4", per 1,000	- 1978: \$ 12.50	
	1980: 53.45	328 percent increase
6"x6", per 1,000	- 1977: 18.77	
	1980: 69.70	271 percent increase
8"x8", per 1,000	- 1977: 28.00	
	1980: 62.00	121 percent increase

Herbarium case for storing specimens

per unit	- 1976: 283.00	
	1980: 436.00	54 percent increase

Blotting paper for drying botanical specimens

100 sheets	- 1978: 11.55	
	1980: 15.35	33 percent increase

Storage cases for specimens

per unit	- 1976: 166.25	
	1980: 203.50	22 percent increase

The significantly higher costs of transporting objects is having a severe impact on exhibitions, collections acquisition, and research programs. Since December 1979 there have been two rate increases which have brought commercial shipping prices up by 20 percent. In addition, air freight charges have increased by eight percent over FY 1979. The Institution anticipates spending approximately \$440 thousand for transportation charges in FY 1980.

The National Zoological Park continues to feel the impact of inflationary increases in the cost of feeding the animal collection. The Zoo estimates that \$260 thousand will be expended in FY 1980 for animal food. These same food items have increased 58 percent over FY 1979 prices. Several measures are being taken to circumvent these inflationary pressures. A staff nutritionist adjusts the diets of some animals substituting less expensive items for more expensive ones. However, the special dietary requirements of some animals do not allow for food substitutions. Crop failures and other factors affecting market prices of food also contribute to the inflated prices the Zoo must bear.

The Institution's facilities management, protection services and administrative functions also continue to witness inflationary impact. For example, computer maintenance costs have increased from \$79 thousand in FY 1979 to \$94 thousand in FY 1980, an increase of 19 percent. Paper used to print computerized reports is projected to increase in cost by 21 percent over FY 1980 prices. Photocopy paper purchased by the Smithsonian has increased from \$77 thousand in FY 1979 to \$90 thousand (estimated) in FY 1980, an increase of 17 percent. The cost is expected to increase an additional 15 percent in FY 1981. Office machine repair costs are expected to rise by 33 percent in FY 1981 over FY 1980. Contractual services for elevator and escalator maintenance cost \$223 thousand in FY 1979 and \$263 thousand in FY 1980, an increase of 18 percent. The cost of uniform cleaning services for the Office of Protection Services has risen from \$38 thousand in FY 1979 to an estimated \$58 thousand in FY 1980, an increase of 53 percent. The cost of some required special cleaning items have escalated as much as 274 percent. The chart below lists price increases of everyday cleaning items, the cumulative impact of which can alter budget planning significantly.

<u>Item</u>	<u>FY 1978</u>	<u>FY 1980</u>	Percentage Increase (inflation rate)
			<u>FY 1978 - FY 1980</u>
Sponges, each	\$.23	\$.86	274 percent
Mop wringers, each	8.50	15.10	78 percent
Cake hand soap, case	19.50	26.00	33 percent
Detergent, drum	176.14	231.00	31 percent
Floor wax, drum	284.63	349.80	23 percent

In view of these inflationary pressures, the Institution's request for a seven percent increase of the nonsalary expenses is a modest one. Yet, such an appropriation will be an important and essential step in trying to maintain the Smithsonian's programs and support activities at a level approximating current effectiveness.

CURRENT SERVICES DECISION PACKAGE 1000-6

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Museum Support Center - related costs. Resources of \$1.743 million and 13 new full-time permanent positions are included in this package as a continuation of a phased plan of meeting the one-time equipment and relocation costs and the continuing operating needs of the Museum Support Center. The additional resources required through FY 1985, the year in which the move of the current collections scheduled to be transferred will be completed, are summarized in the "resources requirements" and "other information" sections of this package.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This Package</u>	<u>Cumulative Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	1,743	125,941	134,887	139,004	142,122	148,365
Outlays (\$000)	106,987	117,759	1,585	125,197	134,005	138,549	141,797	147,767
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	13	3,373				
Total	3,735	3,760	13	3,773				

Short-term objectives:

- To continue the phased program of purchasing essential storage, laboratory and security equipment prior to the occupancy of the Museum Support Center building early in FY 1983.
- To continue the phased staff expansion program, planned to begin in FY 1981, for the Conservation Analytical Laboratory that will enable it to meet its expanded coordinated conservation and training activities at the Center.
- To begin a phased staff expansion program for the Office of Plant Services that will permit it to meet its maintenance responsibilities at the Center.

Impact on major objectives:

Resources sought in this package will facilitate the proper care of the collections and the accessibility of the collections for research, study and conservation purposes.

Other information:

- Museum Support Center Design and Construction Schedule - Plans for the phased equipment purchases, the relocation of collections, and the gradual staff expansion of the Conservation Analytical Laboratory and support units are predicated on a Museum Support Center occupancy date early in FY 1983. The project is proceeding on schedule.

The design phase for the Museum Support Center was completed in June 1980, with the presentation of final plans and specifications by the architect/engineer (Metcalf-KCF) to the General Services Administration. Bid invitations were issued on July 28, 1980 and bids will be received in mid-September. According to the present schedule, the award of a construction contract will be made on October 1, 1980.

Construction funds of \$20.6 million were appropriated to the Smithsonian Institution in FY 1980 for the Museum Support Center. Construction is expected to begin in October 1980, with completion of the structure scheduled for the fall of 1982. The Support Center will be available for occupancy by the Institution early in FY 1983.

- Equipment - Equipment purchases for the Museum Support Center fall into two categories: 1) collection storage equipment for the large storage bays; and 2) laboratory, work area and building operations equipment and furnishings. Acquisition of the equipment in both categories is to be an extended process, expected to continue through FY 1985. The establishment of research laboratories and related functions will be coordinated with the planned, systematic movement of collections from various scientific departments of the National Museum of Natural History and from parts of the collections of the National Museum of History and Technology. Acquisition of equipment for conservation laboratories and for operation and protection of the Museum Support Center also will be coordinated with the program of occupancy and use of the structure.

As an essential preliminary step, an inventory of the collections to be moved is already underway, and will be completed prior to relocation of the departments whose collections are currently scheduled to be moved to the Center. The inventory will provide information for maintaining control of the location of specimens and objects, as well as data for required types and amounts of storage equipment needed at specific times during the process of relocation. (Additional funds for collections inventories are sought in decision package 1000-9.)

- Collections Storage Equipment - With the aid of a consulting firm specializing in materials handling and storage, the Smithsonian has determined that a system of three-tiered self-supporting storage racks, with a variety of integrated modular collection encasement units, would be the most cost and space efficient means of meeting the varied storage needs of the many museum departments. This equipment will house selected parts of the National Museum of Natural History's collections in anthropology, botany, entomology, invertebrate zoology, vertebrate zoology, mineral sciences, paleobiology, the Oceanographic Sorting Center, and a small portion of the collections of the National Museum of History and Technology.

In August 1980, the Smithsonian transferred an amount of \$95 thousand to the General Services Administration to initiate development of design and performance specifications for the equipment system. Funds of \$2.051 million are expected to be used in FY 1981 to purchase storage equipment for the anthropology collection, the largest collection to be moved; the Oceanographic Sorting Center, which will move from rented space at the earliest possible date; and the entomology collection which occupies public space in the National Museum of Natural History. An amount of \$3.030 million is included in the FY 1982 estimates to continue the phased equipment purchase plan.

The equipment purchases planned through FY 1985 will provide safe and accessible storage for existing collections scheduled to be relocated; when the transfer is completed, these collections will occupy approximately 63 percent of the available cubic storage space in the four planned storage bays. Storage equipment for the remaining space will be purchased as required in FY 1986, and in subsequent years mainly using base resources of the National Museum of Natural History.

- Other Equipment - Equipment for research and conservation laboratories, work area furnishings, and equipment for protection and maintenance functions of the Support Center will be purchased in FY 1981 through FY 1984. The units involved include the Conservation Analytical Laboratory, the Anthropology Conservation Laboratory, the Conservation Laboratory of the Museum of History and Technology, the Smithsonian Institution Libraries, Plant Services, Protection Services, Photographic Services, the Sorting Center and the museum departments which are moving collections to the Center. Priority in purchasing schedules will be given to the Conservation Analytical Laboratory which will have a conservation treatment and conservation training component at the Center and to Protection Services. The conservation and security equipment must be in place and operating as soon as possible after the building is occupied. Accordingly, the amount of \$660 thousand, anticipated to be appropriated in FY 1981, will be used to purchase fumigation and other basic equipment that must be installed in order for the Conservation Analytical Laboratory to process collections as they are moved to the Center (\$450 thousand), and security control devices that are compatible with the Institution's proprietary security system. (\$210 thousand)

Funds of \$1.270 million are included in the FY 1982 estimates to continue the purchase of "other equipment" in FY 1982. Of this amount, funds of \$250 thousand, to be used with \$750 thousand of the Institution's nonappropriated Trust funds, will virtually complete equipment purchases for the Conservation Analytical Laboratory and its associated training facilities. The balance of \$1.020 million is scheduled to be used for additional portions of the security system (\$200 thousand), and to initiate equipment purchases for research laboratories and work areas including building management equipment (\$540 thousand), for the conservation laboratory of the National Museum of History and Technology (\$225 thousand) for Smithsonian Institution Libraries equipment needed to serve the entire Center (\$32 thousand) and for Photographic Services (\$23 thousand).

- Operating needs - A total of 13 new full-time positions and \$154 thousand are included in this package for continuing operating requirements of the Museum Support Center.

Eight positions and \$104 thousand are sought to continue to augment the staff of the Conservation Analytical Laboratory (CAL). (Seven new CAL positions are anticipated in FY 1981 and a total of 20 new positions are planned between FY 1982 and FY 1985 to complete the staff.) The proposed increase will enable CAL to meet the expanding conservation needs of the Institution, reduce the backlog of materials requiring treatment, and serve as a clearing house, nationally and internationally, for vital conservation information. Moreover, additional staff will make it possible for the Smithsonian, in cooperation with an area university, to offer a comprehensive conservation training program. This training is essential to fill a critical national need. Presently, there are only four training programs that offer graduate level degrees or their equivalents in conservation in the United States, and these graduate fewer than 30 conservators a year. In addition, only a few major museums offer internship/apprenticeship level training in their conservation laboratories. The training program at the Museum Support Center will be of the highest technical quality so that students completing the program will enter the work force and start their careers as qualified apprentices to master conservators, which is the accepted practice in conservator career development, or as support technicians. When in full operation by FY 1987, CAL's training program proposes to develop approximately 31 qualified conservation apprentices each year. (A total of 62 students will be in training by then; this is expected to rise to 72 by the tenth year of operation.)

Five positions and \$50 thousand are requested for the Office of Plant Services which will have the responsibility for maintenance of the Center's building operating systems. Four of the positions are for engineer foremen who will be capable of operating the building systems as construction nears completion; one position is for a driver to transport curators, plant services and other personnel to and from the Center beginning three months prior to actual occupancy.

The following table summarizes the estimated equipment, relocation and operating costs by year, projected through FY 1986. The table assumes approval of resources requested in this package for FY 1981 and FY 1982.

MUSEUM SUPPORT CENTER
EQUIPMENT, RELOCATION, OPERATING COSTS: FY 1980 - FY 1986
(Dollars are in thousands; FTP positions are in parentheses)

	<u>FY 1980</u>	<u>FY 1981</u>	<u>FY 1982</u>	<u>FY 1983</u>	<u>FY 1984</u>	<u>FY 1985</u>	<u>FY 1986</u>	<u>TOTAL</u>
<u>One-time Costs</u>								
--collection storage equipment	400	2,051	3,030	3,157	1,985	1,200	1,300	13,123
--other equipment and furnishings	-	660	1,270	1,243	1,215	-	-	4,388
--relocation costs	-	-	-	1,062	750	-	-	1,812
Total: One-time costs	400	2,711	4,300	5,462	3,950	1,200	1,300	19,323
<u>Annual Operating Costs</u>	-	(8)112	(21)266	(126)3,306	(133)3,819	(139)4,161	(141)4,416	

ENHANCEMENT LEVEL DECISION PACKAGE 1000-7
Smithsonian Institution
 Salaries and Expenses: 33-0100-0-1-503

Activity description: Exhibitions and Performances. Resources included in this package (\$1.474 million and 5 full-time permanent and 6 full-time equivalent positions) are sought to create a new exhibitions program on Native Americans, to meet major space requirements at the National Museum of Natural History, and to enhance exhibition and performance programs at several museums and bureaus.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	107,764	118,838	1,474	127,415	137,206	141,770	145,367	152,000
Outlays (\$000)	106,987	117,759	1,339	126,536	136,235	141,267	144,994	151,362
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	5	3,378				
Total	3,735	3,760	11	3,784				

Short-term objectives:

- Revise the Smithsonian's outdated exhibitions on American Indians and develop a new, broad-based Native American Program, the goal of which will be comprehensive presentations of the varied and rich history of these peoples based on current scholarship and insights.
- Create a special, permanent gallery space for the showing of important traveling and temporary exhibitions at the Smithsonian.
- Maintain the program of exhibit refurbishment at the National Museum of Natural History.
- Provide essential exhibit support in our various other museums and organizations.

Impact on major objectives:

With resources proposed at this level, total resources devoted to the exhibitions function would increase from \$11.6 million at the current services level to \$13.1 million.

Other information:

This package meets significant exhibitions needs, particularly with respect to a revitalization of the treatment of Native American collections and history at two of the Institution's largest museums, the National Museum of Natural History and the National Museum of History and Technology. There is a provision, also at the National Museum of Natural History, for the use of a new exhibit space for major, exciting traveling exhibitions and temporary exhibitions produced by the Museum and for continuation of a phased program to refurbish its 30 exhibition galleries. In addition, other exhibits requirements at several museums and bureaus in the areas of catalogues, performances, space refurbishment, production and management are addressed.

Native American Program:

The Smithsonian has had an interest in the study of Native Americans dating back to the creation of the Bureau of American Ethnology in 1879. Over the years, the Smithsonian has developed a sizeable collection of Native American artifacts, now numbering approximately 800,000 and has sought to display the experience of the Native American, principally in the National Museum of Natural History. Contemporary studies of Native Americans using archaeological and ethnographic materials and historical tools, including art history, dictate that a major revision of present exhibitions be undertaken to redefine the rich history of these peoples based on current scholarship.

The National Museum of History and Technology (NMHT) traditionally has treated American history as a field of study and exhibition whose starting point was the arrival of English settlers in the early 1600's. This outdated viewpoint needs correction through remedial scholarship and exhibition. The forthcoming major exhibition on George Washington and his times, offers the NMHT a welcome challenge to begin the process by preparing an exhibition portraying the relationships between our Founding Fathers and the Native Americans. This exhibition would be the first in a series of exhibitions on American Indian history which will focus on the rich past of these peoples and aim toward integrating knowledge of that past with our increasing understanding of what the American experience comprises.

The National Museum of Natural History (NMNH) presently devotes four halls to the portrayal of Native American culture. These exhibitions mounted in the period of the 1950's are in most instances outdated in terms of current scholarship and exhibit techniques. This new program offers an opportunity to redo these halls to provide both an informative and more relevant presentation of the Native American experience.

The first exhibitions will focus on the cultures of North American groups from their earliest known evidence to present day, drawing upon the extensive archaeological and ethnographic materials in NMNH. Material goods will show development, migration, intertribal relations and contact with Europeans. The second exhibition will focus on Meso-American cultures and will illustrate the continual cultural shifts in this important area bridging North and South America.

Later exhibitions such as the "Ascent of Man in the New World", will continue a story already begun in NMNH, by displaying man's development, showing man's migration across the Bering Strait and displaying early migrations and distributions throughout North and South America. Additional focus in this exhibition will be on the development and migration of linguistic and tribal groups. A major deficiency in the present exhibition of Native American materials is the lack of space to present an in-depth display of the finest materials in the NMNH collection. It is anticipated that space presently devoted to collection storage will be freed up following the move to the Museum Support Center to allow two Rotunda galleries to be adapted for public use. Simple, well organized glass cases containing a wide variety of Indian objects will be arranged with minimal labeling. For the serious student a card file providing further information will be accessible in several areas.

Funds of \$500 thousand are sought to develop a Native American Program that will offer up-to-date, well-researched and well-designed exhibitions on the history and ethnography of American Indians, drawing on the rich collections of Native American artifacts maintained by the Smithsonian.

Future Year Impact of Native American Program:

Discussions initiated by the Heye Foundation/Museum of the American Indian in New York, and encouraged by members of Congress, could result in the transfer of that Museum's extensive collection of some 250,000 records and 1.5 million objects to the Smithsonian in future years. Should this come to pass, early estimates suggest that one-time costs associated with moving the collection to Washington, and storage equipment for it in the Smithsonian's Museum Support Center would be \$3.4 million. Further, an additional 20 full-time permanent positions and \$500 thousand would be required on a continuing basis for collections management and conservation work.

It should be emphasized that these figures are very tentative and as such will be subject to considerable refinement. Nonetheless, they signal what may prove to be the very welcome opportunity to create a unified collection of Native American materials unparalleled anywhere, greatly enhancing the Smithsonian's ability to relate the history and culture of Native Americans to all people.

Other Exhibitions and Performances Requirements:

- National Museum of Natural History (NMNH) - to establish a new special exhibits program that will sponsor the showing of large, spectacular traveling exhibitions and the development of a temporary exhibition program, produced by the Museum, making use of existing collections not previously displayed. Resources are sought here for program coordinators and exhibits specialists and costs of installing one of the three shows that will be installed each year. (Corporate funding will be sought for renovation of the gallery and for installing the other two shows.) Currently, the Smithsonian does not have gallery space of sufficient size and quality to accommodate large traveling shows. (The National Gallery of Art does have a special exhibits gallery and has hosted a number of important temporary shows; however, it is the Gallery's policy to present only those exhibitions which debut there.) As a result, exhibitions such as "Pompeii A.D. 79," which opened

at the Museum of Fine Arts in Boston, and "Gold of El Dorado," which opened at the American Museum of Natural History in New York and many other fine exhibitions are not displayed in Washington, D.C. The special exhibits gallery also would provide the stimulus for NMNH to assemble exhibits from its own collections that could open in the new gallery and then travel to other cities. Space for the proposed gallery, consisting of approximately 14,000 square feet of prime area on the ground floor of the Museum, will be obtained by completely renovating the gallery near the Constitution Avenue entrance of the building. (\$293 thousand)

- National Museum of Natural History - additional resources are sought, also at the National Museum of Natural History, to sustain the Museum's phased program of rejuvenating its 30 permanent exhibition halls with the goal of improving the quality and effectiveness of exhibitions throughout the Museum. (\$225 thousand)
- National Collection of Fine Arts (NCFA) - to provide for further development of exhibits-related publications which are the permanent record of research endeavors; to upgrade various aspects of all exhibitions, including lighting, labels, and the construction of special cases to display three-dimensional objects, particularly at the Renwick Gallery; and to increase needed support in the handling of loaned objects, both incoming for NCFA exhibitions and outgoing to other museums across the country. (\$75 thousand)
- Freer Gallery of Art - to hire a specialist trained in Asian art history and museum exhibits techniques to work with curators and exhibits staff in designing all of the Gallery's major exhibitions and catalogues and many of the smaller ones; to fund one special exhibition and catalogue annually which will focus in great detail on small, definable parts of the collection; and to expand the publication of leaflets that describe the objects on display. These leaflets are offered free of charge to the public and are of great use to students. (\$68 thousand and 1 full-time permanent position)
- National Museum of History and Technology - to augment funds available to the Museum for publication of catalogues related to new exhibitions as well as re-publication of out-of-print materials still in high demand. (\$80 thousand)
- Museum of African Art - to produce a catalogue to accompany a major exhibition, "African Musical Instruments," and a brochure and checklist for four smaller exhibitions; and to support performances in conjunction with a contemporary Haitian art exhibition. (\$40 thousand)
- National Portrait Gallery - to purchase materials and labor for a phased program of space refurbishment in order to provide more rooms for the exhibition of important early pictures as well as the Gallery's increasing collections of twentieth century images. (\$35 thousand)
- Cooper-Hewitt Museum of Decorative Arts - to provide additional exhibits production staff in support of the Museum's active exhibits program. In the past four years, the Cooper-Hewitt has

presented over 60 exhibitions. (\$25 thousand)

- Smithsonian Institution Traveling Exhibition Service - to enlarge and strengthen the registrarial, education and publication aspects of this program which produces traveling exhibitions in the fields of art, design, science, technology, history, and education for circulation to local museums, galleries and educational and cultural institutions throughout the United States and abroad. (\$120 thousand and 4 full-time permanent positions)
- Smithsonian Institution Press - to purchase additional outside editorial and proofreading services in support of publication of printed materials prepared by Smithsonian historians, scientists and curators. (\$13 thousand)

ENHANCEMENT LEVEL DECISION PACKAGE 1000-8

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Research. Resources included in this package (\$1.322 million and 14 full-time permanent and 16 full-time equivalent positions) are sought to re-establish a competitive Smithsonian Research Awards Program, conduct specific original scientific and historical research, and to provide needed engineering, equipment, publications, travel, computer, and supply funds in support of research.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	107,764	118,838	1,322	128,737	140,656	146,004	150,433	158,239
Outlays (\$000)	106,987	117,759	1,202	127,738	139,480	145,411	149,976	157,487
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	14	3,392				
Total	3,735	3,760	30	3,814				

Short-term objectives:

- To re-establish a competitive Smithsonian Research Awards Program.
- To conduct original scientific research that will produce baseline data that could lead to significant practical applications by mission oriented agencies.
- To produce original historical studies, some of which would be based on Smithsonian collections.
- To provide adequate resources in support of scientific research.

Impact on major objectives:

With resources proposed in this package, total resources devoted to the research function would increase from \$21.4 million at the current services level to \$22.7 million.

Other information:

In addition to providing for a competitive Smithsonian Research Awards Program, this package funds proposed projects of basic scientific research at two of the Institution's science bureaus, the Radiation Biology Laboratory and the National Museum of Natural History. These projects potentially have national and international significance. Resources also are sought for original historical studies at the Museum of African Art based on the rich collections of that Museum, at the National Air and Space Museum, and at the Division of Performing Arts. These scientific and historical studies eventually will result in the publication of scholarly monographs, books and catalogues. A number of research support needs are addressed here, including the provision of engineering assistance and equipment for an x-ray imaging camera laboratory at the Smithsonian Astrophysical Observatory, additional computer capacity and computer programming capability at the Chesapeake Bay Center for Environmental Studies, adequate publications funds at various science organizations, equipment and supplies for animal research programs at the National Zoological Park, and on-line bibliographic searches for researchers throughout the Institution.

Research Awards Program:

Prior to FY 1964, Smithsonian scientists were able to compete with their peers in universities, museums and research organizations for funds from the National Science Foundation (NSF) for individual research projects. In 1964, the Congress limited the authority of the NSF to make grants for scientific research by prohibiting grants to individual Federally employed scientists. While this prohibition was subsequently dropped by the Congress, NSF has continued to carry it out as outlined in NSF Circular 108. The Institution, recognizing the importance to its staff of competitive funds for fundamental research, requested and received funds to establish its own Research Awards Program beginning in FY 1966 with an appropriation of \$350 thousand. Under the Program, all Smithsonian scientists were free to submit research proposals in open competition to an outside evaluation committee of senior scholars drawn exclusively from universities and research organizations throughout the United States. The committee structure and evaluation process was patterned after the successful committee model of the NSF. Following the recommendation in the House-Senate Conference Report 95-1672 dated September 29, 1978, the NSF agreed to review the credentials of the panelists and certify their academic competence. Awards recommended by the outside committee were made to Smithsonian scientists on the basis of the scholar's competence in the field, the originality of approach and the promise of providing new information or techniques in a particular field of scholarship.

Since its inception, results achieved through the Smithsonian Research Awards Program have amply justified the relatively small expenditure of Federal funds (approximately \$5.4 million over 14 years). For example, under the auspices of the Research Awards Program, a scientist at the Smithsonian Astrophysical Observatory has developed a new detector that is being used to observe heretofore unseen objects on the very edge of the known universe. These observations are yielding new information on the structure and evolution of the universe. Also, under a research award, a scientist on the staff of the National Museum of Natural History has provided the most detailed mapping of the geological history of the mid-continental United States. This advanced scientific knowledge has direct application in the search for oil.

The Smithsonian's scholarly activities most clearly parallel the pattern of academic institutions where the majority of resources are directed to furnishing "institutional" costs, i.e. salaries and benefits, space and modest research equipment. A continuing need is for monies to support actual research expenses, i.e. travel, computer time, publication costs, and temporary research technicians. In most universities, this support is sought by the faculty through competitive application to granting organizations, primarily NSF. The Smithsonian strongly believes that a similar opportunity should exist for its own research staff. The incentive provided by the Program for staff scientists to evolve original research projects is crucial to the continued vitality, intellectual growth and scientific integrity of the Institution. The program also is essential if the Institution is to retain the highest quality scientific staff in a competitive marketplace with the universities and private industry.

Smithsonian scientists are hired specifically to conduct their own research in addition to their curatorial or other responsibilities with the expectation that the individual scientist's own new and innovative research be pursued as part of his position requirements. It should be noted that the grants and contracts from Federal agencies are not designed to respond to basic research efforts of individual scientists; rather, these grants and contracts are awarded to the Smithsonian because of its expertise in research areas being pursued by the funding agencies, as, for example, grants and contracts from NASA to the Smithsonian Astrophysical Observatory for the development of the Satellite Tracking Program. Similarly, research funds provided to the individual Smithsonian bureaus are the continuing "institutional needs" of a bureau as distinct from innovative projects being pursued by individual scientists.

No funds were appropriated in FY 1980 for the Research Awards Program and the Institution did not include funds for research awards in its FY 1981 budget request. During the Smithsonian's FY 1981 budget hearing before the House Appropriations Subcommittee, the Chairman suggested that the Institution explore the possibility of Smithsonian scientists once again applying directly to the NSF for research grants. Follow-up discussion by Congressman Silvio Conte, who is a Smithsonian Regent, with the Chairman of the Committee on Housing and Urban Development--Independent Agencies to which NSF reports has elicited no support for this proposal. NSF has subsequently reiterated its policy toward the Smithsonian in Revision 4 to NSF Circular No. 108.

Consequently, in view of the importance that the Institution attaches to a competitive awards program, we are seeking funding of \$300 thousand in FY 1982 to re-establish the Smithsonian Research Awards Program. We point out that the expenditure of Federal funds for basic research is consistent with President Carter's stated objective of supporting basic research. The President, in urging the Congress to fund basic research programs, has written that "...encouragement and support for basic research by the Federal government is essential for the discoveries and technological innovations fundamental to our economic well-being and to our national security." The Smithsonian Research Awards Program precisely accords with Presidential policy and national goals.

Other research requirements:

- Radiation Biology Laboratory (RBL) - to develop an expanded program of measuring the effects of ultraviolet radiation on plants. There is a heightened public awareness of ultraviolet solar energy (especially in the region known as UV-B) due to suspected changes in the ozone concentrations in the atmosphere. Scanning radiometers developed at RBL permit the precise monitoring, on a daily and seasonal basis, of the fluctuations of ultraviolet radiation received at the earth's surface. Using these new ultraviolet data, RBL plans to develop a program of research to measure plant responses (including their growth patterns and developmental limits) to changes in the ultraviolet under controlled environmental conditions in which the ultraviolet energy is varied as well as under field conditions. The effects of increased ultraviolet on plants are not known definitively at present, and data from RBL's proposed program are potentially of significant national and international interest. (\$166 thousand and 3 full-time permanent positions)
 - Smithsonian Astrophysical Observatory (SAO) - to establish a permanent x-ray imaging camera laboratory. Since the formation of the High Energy Astrophysics Division in 1973, SAO has been a leader in the development of single photon imaging cameras for space astronomy. This is most recently evidenced by the instrumentation developed by SAO that is currently in use on the Einstein satellite. Future space observatories are now in the planning stage such as the Advanced X-ray Astrophysics Facility (AXAF) and the Large Area Modular Array of Reflectors (LAMAR) which will use x-ray cameras to study in detail the broad range of objects that have been discovered to date. In order to exploit fully the capabilities of these future facilities, advanced instruments are required that would provide improved resolution, high efficiency and a broad spectral response over a large field of view. The proposed x-ray imaging camera laboratory would provide continuity for the study of new instruments, thus making it possible for SAO to remain in the forefront of instrument technology for x-ray astronomy and to play a major role in future x-ray observatory missions. (\$160 thousand and 2 full-time permanent positions)
- In addition, SAO is seeking funds for its Langley-Abbot Program of solar research. The funds would be used to maintain the short-term visitors studies on solar physics, complementing the work of permanent staff, and to provide adequate research support funds for the Program. (\$50 thousand)
- National Museum of Natural History (NMNH) - to accelerate its program of base-line studies of insects that have a destructive effect on food production or public health. New biological control programs aimed toward elimination of harmful insects by such means as the cultivation of natural enemies are now being tested by State and Federal agencies. In order to be successful, these programs depend upon rapid and absolutely accurate identifications of target insect species. NMNH conducts basic entomological research on biological life histories, immature insect stages, geographical distributions, parasitic relationships and identification aids. For example, work is underway on the clothes and the carpet moths of the new world, bees of North America, and on control insects such as the fresh water beetles of North America and the predaceous ground beetles of Middle America. Additional resources are requested to accelerate the progress of these studies. (\$114 thousand)

- Chesapeake Bay Center for Environmental Studies (CBCES) - to enable the Center to develop its own data management and programming capability and to acquire additions to a mini-computer that will be purchased in FY 1981. As the Center has become increasingly involved in long-term environmental monitoring, the amount of data needed to be acquired and processed has increased enormously. Between, FY 1976 and FY 1979, the number of data points collected has risen from 600,000 to 3 million and is expected to approach 30 million by 1985. An outside review of the Center's data processing needs, completed in FY 1980, urged acquisition of a computer (to be accomplished in FY 1981 and expanded in FY 1982 with funds sought here), the employment of a staff programmer and the addition of a senior data manager who would be responsible for the overall data processing operation as well as provide assistance in solving statistical problems associated with research.

In addition, external reviews of the Center's scientific programs have urged that biological modeling expertise be added to the research staff. Such expertise would promote a better overall synthesis of research projects and permit more effective and timely integration of research results on the effects of environmental factors on biological communities.

Resources sought in this package would enable CBCES to meet all of these needs. (\$90 thousand and 3 full-time permanent positions)

- International Environmental Science Program (IESP) - to fund increased costs of publications and travel. The International Environmental Science Program coordinates the capabilities of the Smithsonian's science bureaus to study ecosystems subject to human disturbance in order to evaluate and ultimately predict the consequences of these human activities. The results of IESP research are, in many instances, statistically oriented and cannot be published in scientific journals because of the quantity of data produced and restrictions on space in many journals. Moreover, a number of monographs in excess of 300 pages have been developed recently and are planned in FY 1982. Additional funds are sought to enable these studies to be published. (\$50 thousand)

Additional funds also are requested to defray the rising cost of essential international travel. Due to seasonal variabilities of the ecosystems under study, a scientist may be required to visit a site several times a year. (\$50 thousand)

- Smithsonian Tropical Research Institute (STRI) and the National Museum of Natural History (NMNH) - to provide additional funds for publications at these bureaus. The volume of manuscripts being produced by scientists at the Smithsonian Tropical Research Institute and the National Museum of Natural History is growing while costs associated with publishing them have continued to increase. (\$87 thousand)

- National Air and Space Museum - to document in historical perspective the recent, revolutionary changes in geophysics and atmospheric sciences brought about by space flight and by interplanetary space probes such as Viking - Mars, Mariner 10, and Voyager. Focus would be on documenting the working instruments that accomplished these flights and the technologies that led to their development. (\$90 thousand and 3 full-time permanent positions)
- National Zoological Park - to upgrade equipment in the Pathology and Research laboratories and to purchase drugs and supplies for research projects. (\$13 thousand)
- Folklife Program - to permit advanced fieldwork to be carried out for the annual Folklife Festival thus allowing plans to be made with more than ten months of lead time; and to provide for publications based on the research and documentation already gathered of American grassroots traditions for which fieldwork has been conducted in preparation for the Festivals and in related research projects. (\$36 thousand)
- Museum of African Art (MAA) - to hire a research curator who would produce scholarly studies on MAA's collection and on materials loaned to the museum, write and edit catalogues and labels, and provide teaching and lecturing services to visiting groups. (\$45 thousand and 1 full-time permanent position)
- Smithsonian Institution Libraries - to provide on-line searches of reference materials for all researchers in the Institution. (\$35 thousand)
- Division of Performing Arts - to hire two musical researchers to develop a scorebook of the record album "Smithsonian Collection of Classical Jazz" and to write a history of popular entertainment. Many of the classical jazz pieces recorded on the popular Smithsonian album have never been scored. Score notation also would be provided which would insure that these works are performed exactly as the composer intended. In addition, studies in early popular forms of American entertainment (such as circuses, fairs and traveling shows) would be produced to identify the major performers, what entertainment techniques or innovations were developed and their effect on the development of entertainment in America. These studies will result ultimately in performances, exhibitions, catalogues and publications. (\$36 thousand and 2 full-time permanent positions)

ENHANCEMENT LEVEL DECISION PACKAGE 1000-9

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Collections Management. Resources included in this package (\$894 thousand and 26 full-time permanent and 1 full-time equivalent position) will be used to meet collections management requirements throughout the Smithsonian, including the acceleration of the Institution's Collections Management/Inventory Program and remedial action to correct several conservation, collections storage, and cataloguing needs.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	107,764	118,838	894	129,631	146,468	148,570	153,338	161,469
Outlays (\$000)	106,987	117,759	813	128,551	144,837	148,231	152,873	160,687
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	26	3,418				
Total	3,735	3,760	27	3,841				

Short-term objectives:

- To provide necessary care for the collections by improving storage spaces and upgrading conservation and preservation facilities.
- To accelerate the Collections Management/Inventory Program currently in progress at the National Museum of Natural History, National Museum of History and Technology, Cooper-Hewitt Museum and elsewhere in the Institution.
- To increase accessibility to the collections by improving and modernizing indexing and cataloguing methods.

Impact on major objectives:

With resources proposed in this package, total resources devoted to the collections management function would increase from the \$19.4 million requested at the current services level to \$20.3 million.

Other information:

The collections management function is a broad category that encompasses various aspects of the care of the collections. These consist of detailed record keeping or cataloguing, regular inventories, storage or display in secure and atmospherically controlled environments, and conservation of the objects in the collections. The collections management function continues to be a high priority of the Institution. Additional resources of \$894 thousand and 26 full-time permanent positions are sought to accelerate an Institution-wide collections management/inventory program that was begun in FY 1979 and to address remedial needs in several museums and bureaus. These resources will be applied as follows:

- Collections Management/Inventory Program - In September 1978, the Institution developed a plan for scheduling and performing inventories of its collections. The successful implementation of this plan continues to be a high Institutional priority. In FY 1979, a special appropriation of \$500 thousand was made to the Institution to accelerate this process. These funds were applied to major inventory projects in the following three museums where the need for additional effort was of greatest urgency: (1) the National Museum of Natural History (NMNH); (2) the National Museum of History and Technology (NMHT), both of which will move some of their collections to the Museum Support Center starting in 1982; and (3) the Cooper-Hewitt Museum, whose collections had not been inventoried fully prior to the Museum's transfer to the Smithsonian. In FY 1980, funds of \$538 thousand were appropriated to continue this program. These funds are being used to continue the inventory efforts at the three original museums; to computerize the inventory of the "Smithsonian Art Index" at the National Collection of Fine Arts; and to provide additional data processing capability to cope with the vast amount of inventory information gathered by various inventory projects. These special appropriations have made it possible for the Institution to develop inventory techniques and methods of recording inventory data that will be applied to future inventory and collections management efforts. Funds of \$558 thousand are anticipated to continue this Program in FY 1981 and an additional \$200 thousand is sought to accelerate continuing efforts in FY 1982. The requested increase will provide funding for 15 full-time permanent (term) positions to perform inventory services in the museums involved and for computer processing of inventory records. An additional six full-time permanent (term) positions are sought using a portion of base funds. These new positions are needed in order to retain trained people for the conduct of specialized inventories of the various collections.
- National Collection of Fine Arts (NCFA) - To facilitate expanded storage space through the purchase of shelving and sliding metal racks and other equipment for a renovated storage area at 1111 North Capital Street and for rearranged storage space within the Fine Arts and Portrait Gallery. The provision of additional storage space is critical for NCFA whose collection of approximately 25,000 objects is expected to increase by 1,000 objects a year. In addition, NCFA is seeking funds for conservation work required to preserve and to maintain for exhibition some 60 paintings and 125 portrait miniatures and to survey and evaluate conservation needs associated with its collection of almost 15,000 prints and drawings. (\$155 thousand)

- National Museum of History and Technology - To provide more efficient space at the Museum's improved storage buildings at Suitland, Maryland through the purchase of shelving and other storage materials. (\$150 thousand)
- Freer Gallery of Art - To hire a senior supervisory oriental art restoration specialist who will work on the restoration of Chinese, Japanese, and Korean scrolls. The Freer Gallery is one of only three museums in the country that has this type of capability. (\$43 thousand and 1 full-time permanent position)
- Archives of American Art - To promote the preservation of the increasing collections by purchase of microfilm and appropriate storage supplies, including acid-free paper, for the over 200,000 items received annually. (\$42 thousand)
- National Portrait Gallery - To upgrade storage space by purchase of shelving and bins for sculpture and unframed picture storage, and to convert a part-time registrarial assistant to full-time permanent in order to cope with a heavy workload exacerbated by the preparation of the large traveling exhibition, "Champions," to be shown at museums in Chicago, Los Angeles, and New York City. (\$30 thousand and 1 full-time permanent position)
- Hirshhorn Museum and Sculpture Garden - To purchase word processing equipment for improved control and efficiency in registering and cataloguing collections, loans, etc. in the registrar's office. (\$20 thousand)
- National Anthropological Film Center - To begin the task of cataloguing and indexing the approximately 2 million feet of film produced by the Film Center, representing aspects of vanishing cultures throughout the world. (\$68 thousand)
- National Zoological Park - To hire an animal keeper for the Zoo's Front Royal Conservation and Research Center's waterfowl complex. (\$15 thousand and 1 full-time permanent position)
- National Museum of Natural History (NMNH) - To hire a shipping clerk who would process through NMNH's shipping unit packages and materials for the Radiation Biology Laboratory, and organizations located in the Arts and Industries Building, Smithsonian Institution Building and L'Enfant Plaza. (\$16 thousand and 1 full-time permanent position)
- Smithsonian Institution Libraries - To begin a program through service contracts to convert all card catalogue records to machine readable form for inclusion in an automated catalogue; to expand a program scheduled to begin in FY 1981 that will promote book conservation through deacidification of paper; and to expand purchases of books and journals for the Museum of African Art and the Cooper-Hewitt Museum. (\$119 thousand)

- Office of the Registrar - To hire a transportation specialist who would provide advice and assistance to all Smithsonian units on such problems as customs clearances, freight tariffs, carrier selection, and safe packaging methods. (\$23 thousand and 1 full-time permanent position)
- Smithsonian Institution Archives - To increase microfilming capability and to automate the indexes to the Secretary's files. (\$13 thousand)

ENHANCEMENT LEVEL DECISION PACKAGE 1000-10

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Facilities Management, Protection Services, and Administration I. Resources included in this decision package (\$1.759 million and 31 full-time permanent and 2 full-time equivalent positions) are designated for a) the care of Smithsonian buildings and other physical facilities; b) the protection of Smithsonian facilities, collections, visitors, and staff; and c) the strengthening of selected areas of the Institution's administration.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	107,764	118,838	1,759	131,390	149,959	153,145	159,151	168,360
Outlays (\$000)	106,987	117,759	1,599	130,150	148,156	152,691	158,563	167,469
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	31	3,449				
Total	3,735	3,760	33	3,874				

Short-term objectives:

- To provide maintenance services to the physical plant at all Smithsonian facilities in support of research, exhibitions, and collections management.
- To assure adequate protection of the collections, buildings, visitors and staff.
- To meet the most critical needs in administration according to a phased program designed to improve several key areas of the Institution's administration.

Impact on major objectives:

With resources proposed in this package, total resources devoted to the facilities management, protection services and administration function would increase from \$67.1 million requested at the current services level to \$68.9 million.

Other information:

Facilities management covers the basic maintenance and minor operational repair of the Smithsonian's large and complex physical plant on or near the Mall, at the National Zoological Park, and at a number of outlying locations. It also includes grounds maintenance, horticultural displays in support of exhibitions and programs such as vehicle replacement and maintenance in support of research projects at outlying Smithsonian bureaus. Additional resources (\$714 thousand and 12 full-time permanent positions) are requested in FY 1982 to meet the following facilities management requirements:

- Smithsonian Tropical Research Institute, Chesapeake Bay Center for Environmental Studies, National Zoological Park, and the Smithsonian Astrophysical Observatory (Multiple Mirror Telescope site at Mt. Hopkins, Arizona) - to provide additional staff and funding for materials necessary to repair specialized vehicles and marine equipment and to replace vehicles, boats and scientific equipment used in support of research at these installations. (\$134 thousand and 1 full-time permanent position)
- National Air and Space Museum and South Group Buildings Management (which consists of the Smithsonian Institution and Arts and Industries Buildings) - to provide additional janitorial services and general facilities services. For the National Air and Space Museum, there are increased maintenance requirements as the building ages. Additional demands have been placed on the South Group Buildings Management as a result of the creation of additional exhibits space and the remodeling of larger offices into more numerous small ones. (\$87 thousand and 8 full-time permanent positions)
- Office of Horticulture - to improve existing landscapes around each Mall museum, and to provide additional staff for grounds maintenance. (\$50 thousand)
- Smithsonian Tropical Research Institute - to provide additional funding for increased utilities costs which now are paid to the Government of Panama and to hire an electrician to replace unsafe wiring at several locations throughout the Institute. (\$26 thousand and 1 full-time permanent position)
- National Zoological Park - to hire a heating, ventilating, and air conditioning mechanic and related equipment to maintain mechanical systems at several new zoo exhibits. (\$40 thousand and 1 full-time permanent position)
- Office of Plant Services - to provide adequate base funds for supplies and equipment used in the operation, maintenance, and repair of 11 museums and art gallery buildings and a number of other work and collection storage areas located in the Washington metropolitan area and to hire a transportation specialist to institute a comprehensive vehicle management, car pool and van pool program. (\$377 thousand and 1 full-time permanent position)

The Office of Protection Services (OPS) has overall programmatic responsibility for the security, fire protection, safety, and health programs of the Smithsonian. OPS staffs the protection force and health units for museums on or near the Mall. The National Zoological Park operates its own police force, and outlying bureaus also staff their own protection components. Additional resources (\$512 thousand and 12 full-time permanent positions) are sought for the following protection requirements:

- Office of Protection Services - to continue to eliminate, in a phased manner, a staffing shortage of museum guards. Thorough evaluations of the Institution's protection requirements indicate that the existing facilities are understaffed by over 50 permanent guards. An additional ten full-time permanent security positions and associated funds are requested in FY 1982. These would permit an additional nine guards to be assigned to exhibition halls in three museums and galleries where the shortage is most severe: the National Museum of History and Technology, the National Museum of Natural History, and the Fine Arts and Portrait Gallery, and allow for the hire of a security specialist to aid in investigations and pre-employment background checks of security personnel. Funds also are requested to eliminate a continuing base salary shortage in this Office; to establish a health unit in the Fine Arts and Portrait Gallery Building to serve staff and visitors to the National Portrait Gallery, National Collection of Fine Arts, and Museum of African Art, and staff of the Smithsonian Institution Service Center; and to improve health care at existing health units. (\$430 thousand and 10 full-time permanent positions)
- Smithsonian Astrophysical Observatory - to hire a safety specialist who would provide guidance on a day-to-day basis in the areas of safety, health, and fire protection. (\$42 thousand and 1 full-time permanent position)
- Smithsonian Tropical Research Institute - to hire a diving safety officer in support of marine research conducted at the Institute. (\$15 thousand and 1 full-time permanent position)
- National Collection of Fine Arts - to purchase alarms and safety devices for high-value objects in cases. (\$25 thousand)

Specialized administrative and support services such as design and construction, personnel, including equal employment opportunity, budget, accounting, legal, and computer services are provided centrally in order to promote efficiency and cost effectiveness. In addition, Smithsonian museums, bureaus and offices have small administrative staffs to oversee the general administration of the particular unit. Additional resources (\$533 thousand and 7 full-time permanent positions) are sought for the following administrative requirements:

- Office of Personnel - to assist with the strong Institution-wide objective of recruiting minorities into professional occupations; to provide more personnel assistance to larger and to outlying bureaus; and to cope with the merit pay and other provisions of the Civil Service Reform Act implementation. (\$75 thousand and 3 full-time permanent positions)

- Office of Equal Opportunity - to expand the Institution's cooperative education program by funding two additional students for a total of 20 in the program (14 funded from Federal funds and 6 from the Institution's Trust funds); to place more public information articles and advertising in minority and women's media sources, and to engage in more community outreach activities such as presentations at minority and women's conferences. (\$32 thousand)
- Office of the Treasurer - to purchase additional computer time to modify and improve a new personnel/payroll system to be implemented during FY 1981; to test and upgrade a purchase order/payable system and to meet the cost of a generally increased volume of computer usage. (\$80 thousand)
- Office of Programming and Budget - to meet increasing workload particularly in the areas of budget execution, further integration of the Institution's appropriated and nonappropriated funds budgets, and clerical assistance in support of budget analysis. (\$51 thousand and 2 full-time permanent positions)
- Office of Design and Construction - to obtain additional outside architectural and engineering services in lieu of adding staff to meet the heavy workload stemming from the overall growth in the restoration and renovation of buildings appropriation; and strengthen the administration of design and construction activities through the addition of a Deputy Director. (\$98 thousand and 1 full-time permanent position)
- Office of the Coordinator of Public Information - to correct a continuing deficit in this office related to the purchase of English and foreign language versions of the Smithsonian "Welcome Brochure" and the purchase of public service announcements on television. (\$65 thousand)
- Office of Computer Services - to expand central computer capacity in order to accommodate new data entry users; and to purchase software packages used in support of research and administrative work. (\$36 thousand)
- Office of General Counsel - to meet a heavy caseload in specialized legal areas such as trusts, federal contracts, federal and state taxes, and environmental/conservation law. (\$31 thousand and 1 full-time permanent position)
- Office of the Director of Facilities Services - to convert a part-time clerical position to full-time permanent as a result of increased workload, particularly in the areas of design and construction oversight. (1 full-time permanent position)
- Office of Printing and Photographic Services - to accelerate the process of converting hazardous nitrate film into copy negatives or archival quality safety film where such prints are needed to meet curatorial research and archival requirements. (\$35 thousand)

- Office of Supply Services - to purchase computer services in support of automated procurement programs and requirements of the mandatory Federal Data Reporting and to meet the costs of copier paper. (\$50 thousand)
- Radiation Biology Laboratory and other bureaus - to purchase needed office equipment and supplies. (\$35 thousand)

Funds of \$55 thousand and 1 full-time permanent position are relinquished as a result of a staff reduction in the Office of the Under Secretary; these resources are being used to help offset the proposed increases in the administrative areas.

ENHANCEMENT LEVEL DECISION PACKAGE 1000-11

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Education and Public Orientation. Resources included in this decision package (\$215 thousand and one full-time permanent and 6 full-time equivalent positions) are sought to establish and strengthen education programs of the Institution, both in Washington, D.C. and in outlying bureaus. These programs are directed toward educators, school children, specialized groups, and the general public and have as their ultimate goal the dissemination of the Institution's varied resources to larger numbers of people throughout the Nation.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This</u> <u>Package</u>	<u>Cumulative</u> <u>Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	215	131,605	151,038	154,475	160,668	170,216
Outlays (\$000)	106,987	117,759	195	130,345	149,155	153,991	160,060	169,292
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	1	3,450				
Total	3,735	3,760	7	3,881				

Short-term objectives:

- To make the resources of the Institution more accessible to educators, school children, and the interested public throughout the Nation.
- To strengthen the Institution's Native American Training Program whose purpose is to assist Indian, Eskimo, and Aleut groups to become familiar with professional museum techniques.
- To increase responsiveness on the part of the Smithsonian to public inquiries about the Institution.
- To provide adequate support funds for the education program of the Smithsonian Tropical Research Institute with major focus on environmental education materials, and for other educational support needs.

Impact on major objectives:

With resources proposed in this package, total resources devoted to the education function would increase from the \$4.4 million requested at the current services level to \$4.6 million.

Other information:

- National Collection of Fine Arts (NCFA) - The National Collection of Fine Arts conducts an extensive education program. During this past year, over 20,000 visitors were conducted through NCFA and the Renwick by 90 docents, and 25 workshops were organized for teachers and others at all educational levels. NCFA proposes to strengthen this program in FY 1982 by planning, developing, and producing educational materials on the study of American art that could be integrated with school curricula on the humanities and social studies. Resources are included also for expanded production of short films and video presentations on NCFA collections and exhibitions and for increasing the number of public lectures and demonstrations to explain specific exhibitions and techniques. (\$77 thousand)
- Visitor's Information and Associates Reception Center - The additional resources will be used to help respond to the over 50,000 inquiries, both telephone and mail, that are received each year about Smithsonian programs, and to provide additional supplies and printing. (\$28 thousand)
- Office of Museum Programs - This office conducts training for museum personnel throughout the United States and abroad. An important part of this Office's function involves the training of Native Americans through provision of technical assistance to Native American museums, and through workshops at the Smithsonian and in the field. The Program has contributed substantially to improvements in tribal museums and cultural centers and has enabled a number of Native Americans to become better informed of the ways in which to preserve the tangible evidence of their cultures. Resources are sought to expand these efforts by providing additional workshops, internships and advisory services. New funds are sought also for the Office of Museum Programs mainly in support of its Conservation Information Program. This Program produces audiovisual presentations illustrating and explaining museum practices and techniques with an emphasis on conservation. These are offered on loan to museums, museum-related organizations and schools throughout the country. (\$54 thousand)
- Other - Resources are requested in support of education programs at the Smithsonian Tropical Research Institute in Panama which emphasizes mainly environmental and conservation education; and at the Smithsonian Astrophysical Observatory's Mt. Hopkins, Arizona facility, site of the Multiple Mirror Telescope to facilitate a public visitation program to the site. Additional resources are sought also for the Office of Elementary and Secondary Education to add a part-time position to the writing staff of that Office's very successful school publication, "Art to Zoo," and for the Office of Telecommunications for basic supplies and equipment. (\$56 thousand and 1 full-time permanent position)

ENHANCEMENT LEVEL DECISION PACKAGE 1000-12

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Collections Acquisition I. Resources sought in this decision package (\$320 thousand) will be used for purchases for the National Collections in several art museums.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This Package</u>	<u>Cumulative Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	320	131,925	151,623	155,340	161,823	171,661
Outlays (\$000)	106,987	117,759	291	130,636	149,713	154,828	161,187	170,707
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	-	3,450				
Total	3,735	3,760	-	3,881				

Short-term objective:

- To assist Smithsonian art museums in maintaining the importance of the National Collections and to meet the responsibility of carefully planned development necessary in support of research, exhibition, and education programs.

Impact on major objectives:

- With resources proposed in this package, total resources devoted to the collections acquisition function would increase from \$1.0 million at the current services level to \$1.3 million.

Other information:

The funds requested in this package will be used for purchases of works of art by the Freer Gallery of Art, Hirshhorn Museum and Sculpture Garden, Museum of African Art and the National Collection of Fine Arts. The most compelling reason for seeking additional acquisitions funds is to enable these Smithsonian museums to maintain important and representative collections in their specialized fields, particularly as knowledge gained through research points to gaps in existing collections.

It should be noted that there are two other places in this budget where acquisitions for the collections are discussed. In the introductory section, we point out that an amount of \$1 million of the Institution's nonappropriated Trust funds is available annually for acquisitions. When this allocation was first approved by the Board of Regents, it was planned that these funds would be used for major acquisitions. With the rapidly increasing price of art objects, the annual allocation of a million dollars among seven Smithsonian museums now covers at best only purchases in the middle price ranges. Consequently, in addition to the annual allocation of Trust funds for acquisitions, we are making a special appeal in decision package 1000-14 for funds of \$10 million to enable the Institution to compete for the most important works of art or collections when unique opportunities to make such purchases present themselves. Resources included in this decision package are designated for important but small purchases on a planned, regular basis.

The Freer Gallery of Art presently has no Federal acquisitions base. Since the Gallery's inception, it has relied on its endowment and gifts for additions to the collection. With the huge and growing increase in the price of oriental art objects coupled with the tremendous inflation in operating expenses, the Freer endowment no longer provides sufficient funds for the Gallery to continue making important additions to the collection. For example, a fifteenth century blue and white porcelain Chinese dish sold for \$1,300 in 1953; in 1978, the same dish sold for \$70 thousand. Federal funds of \$100 thousand to be used in association with the Freer endowment funds are sought to strengthen the acquisitions capability of the Freer. The Gallery also will continue to rely on gifts for additions to the collections.

The Hirshhorn Museum and Sculpture Garden was established in 1966 as a major museum of contemporary art. As such, the Museum must continue to acquire contemporary works in order that the passage of time not invalidate the contemporary nature of the Museum. Although the Hirshhorn relies largely on gifts, a sufficient Federal base for acquisitions is mandatory in order to permit the Museum to seek out opportunities for acquiring contemporary works in areas where the collection is weak. Additional funds of \$100 thousand are requested for this purpose, to be added to a Federal acquisitions base of \$233 thousand.

The Museum of African Art has never had a collections purchase program. In FY 1981, Federal funds of \$30 thousand are anticipated to remedy this situation. An additional amount of \$70 thousand is sought in FY 1982 to give the Museum the flexibility to acquire the occasional superb object which will enhance the quality of the collections. Reliance on gifts and bequests, however, will continue to provide the principal means for new acquisitions.

The basic commitment of the National Collection of Fine Arts (NCFA) is to explore and present to the public new areas and aspects of American art. As new discoveries are made and new perspectives gained, the museum must be able to fill gaps in its collection when opportunities arise. Additional funds of \$50 thousand are requested for this purpose in FY 1982, to be added to a Federal acquisitions base of \$215 thousand. Like the other museums, gifts and bequests constitute the National Collection of Fine Arts' main source of acquisitions.

ENHANCEMENT LEVEL DECISION PACKAGE 1000-13

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Other National Services. Funds of \$197 thousand are requested to bring funding for the National Museum Act up to the authorized level of \$1 million.

The National Museum Act is a technical assistance program under which grants are made for specific proposals to enhance the quality of museum operations by training in museum work and conservation, encouraging research and special studies for improvement of museum methods and practices, and assisting in the dissemination of technical information to the museum profession.

Resource requirements:	1980	1981	1982		Planning Estimates			
			<u>This</u> <u>Package</u>	<u>Cumulative</u> <u>Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	197	132,122	151,695	155,412	161,895	171,733
Outlays (\$000)	106,987	117,759	179	130,815	149,795	154,901	161,258	170,780
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	-	3,450				
Total	3,735	3,760	-	3,881				

Short-term objective:

- To meet the needs of the museum community by expanding the National Museum Act to its authorized level of \$1 million.

Impact on major objectives:

With funding at this level, the total resources devoted to other national services would increase from \$1.1 million at the current services level to \$1.3 million.

Other information:

- P.L. 96-268, signed on June 3, 1980, reauthorizes the National Museum Act (NMA) for two years at levels of \$803 thousand in FY 1981 and \$1 million in FY 1982. Since the Program's inception, grants have been provided for fellowships, internships, seminars and workshops, and travel-study projects, many of them concentrating on studies in museum conservation. The Act has enabled professional museum organizations and associations to offer improved technical services to museums and their

employees and has contributed to studies and research resulting in more effective museum performance and more advanced conservation practices. The National Museum Act is able to fund, fully or in part, only about 38 percent of the grant applications received. For example, in FY 1980, 60 of the 156 applications submitted were supported. Additional funding of \$197 thousand will allow the support for a greater number of meritorious proposals.

- Under Section 1719, Title 44 of the U.S. Code, the Library of Congress receives a number of U.S. Government publications for distribution to foreign governments who, in turn, agree to send similar publications to the United States. In the late 1800's, the Smithsonian accepted responsibility for the preparation and dispatch of these exchange publications through its International Exchange Service. In the past several years, it became evident that the Government Printing Office (GPO), with its modern and highly mechanized direct mailing operation, could perform this transfer function more efficiently. At the initiative of the Library of Congress, in 1977, the Smithsonian and the Government Printing Office reached an agreement to achieve the transfer of this function through a request to the Congress to amend Section 1719, Title 44 of the U.S. Code. In December, 1977, the GPO assumed the physical responsibility for the international exchange of U.S. Government documents. Since then, the Smithsonian has been reimbursing the GPO for costs incurred in the carrying out of this function.

The volume of mailings and associated costs have been increasing drastically since 1977. For FY 1981, the Smithsonian sought additional funds to cover these higher costs. This request was not approved by the Office of Management and Budget. With legislation to achieve the transfer expected to be enacted prior to FY 1982, the Institution is not seeking additional funds in this budget request to cover the anticipated cost of these mailings. Instead, the Institution will inform the Government Printing Office that a base transfer of \$125 thousand will be made when the legislation is enacted and that additional funds required for FY 1982 (now estimated to be approximately \$175 thousand) should be sought in that organization's budget request.

ENHANCEMENT LEVEL DECISION PACKAGE 1000-14

Smithsonian Institution

Salaries and Expenses: 33-0100-0-1-503

Activity description: Collections Acquisition II. (Major Acquisitions Program) Resources included in this package will be used to establish a new, centrally administered major acquisitions fund of \$10 million for the national museums of the Smithsonian Institution without regard to fiscal year limitation. The fund would be replenished as it is used. For planning purposes, an amount of \$5 million is anticipated in each succeeding year.

This request for acquisitions funds is distinguished from the acquisitions request proposed in decision package 1000-12 by its emphasis, its magnitude, and by the proposal that funds for a major acquisitions program be appropriated on a no-year basis.

The plan being proposed here is designed to benefit not so much the Smithsonian Institution as the millions of visitors from every state of the Union who come to the national museums each year--an estimated 25 million visits this year. These are people who view the national museums as their museums, and the National Collections as their collections, and who quite properly take pride in these institutions which they support through their taxes. The Smithsonian, for its part, feels a deep sense of responsibility to insure that the National Collections are worthy of their name and that they will continue to be a source of pride and satisfaction to the nation. This sense of responsibility is reflected in the Institution's continuing efforts to raise nonappropriated Trust funds for the support of all its programs, including collections acquisitions, but it also leads the Institution on occasion to inform the Office of Management and Budget of special needs that can only, in our judgement, be met by a special infusion of appropriated funds.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This Package</u>	<u>Cumulative Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	10,000	142,122	156,695	160,412	166,895	176,733
Outlays (\$000)	106,987	117,759	5,000	135,815	154,795	159,901	166,258	175,780
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	-	3,450				
Total	3,735	3,760	-	3,881				

Short-term objective:

- To assure that the nation's national museums have the capability to acquire objects and collections of objects of the greatest importance for the benefit of future generations.

Impact on major objectives:

With resources proposed in this package, total resources devoted to the acquisitions function would increase from \$1.3 million proposed at the first acquisitions enhancement level (Decision Package 1000-12) to \$11.3 million.

Other information:

The Need. The history of the Smithsonian's museums, their status as national museums, and their location in Washington combine to create special problems for them in the area of acquisitions. Many of these problems result simply from the fact that in some fields, and notably in the arts, the Smithsonian for nearly a century was essentially passive and haphazard in its collecting activities. This means that virtually all Smithsonian museums must now exert a special effort to build up appropriate and representative collections of objects that could have been acquired with relative ease and little expense some generations ago. Unfortunately, the Smithsonian and its museums did not over the years build up the substantial endowment funds that now play such a key role in the acquisition programs of great private museums. The Board of Regents over the past few years has attempted to remedy this situation, and continues to do so, but hereagain the task of catching up is large and difficult and a solution can not be expected for many years to come. Finally, it can not be denied that the status of our museums as the national museums, and their location in Washington, largely deprives them of the sort of community-based local support that is so important to the great private museums of the United States. Indeed, the Institution is sensitive to the problems that might be raised by our competing aggressively for support with private museums in their own localities, and attempts instead through a number of programs to assist and strengthen these museums. For all these reasons, the Institution believes that it is most appropriate to turn to the Office of Management and Budget and the Congress for assistance in supplementing its own efforts in the area of major acquisitions.

What is at stake is nothing less than the ability of the Smithsonian's national museums to continue to acquire objects and collections of objects of the greatest importance for the benefit of future generations. In the face of the most extraordinary inflation in the prices of works of art of all kinds--"primitive" art, decorative arts and photographs no less than fine arts and of ethnographic objects--and in the face also of apparently unlimited demand for such objects from private collectors and investors here and abroad, as well as private and public museums throughout the world, our national museums can no longer rely solely upon the traditional sources from which their collections have come: private gifts and bequests, modest annual acquisitions appropriations for some of our museums, and Smithsonian Trust funds.

It is scarcely necessary this year to speak at great length about the pace at which art and ethnographic objects' prices have been rising. The recent sales of a Turner painting for seven million dollars, and of a Van Gogh for five million dollars suffice to make the point; sales of individual works for one or two million dollars, which used to be front page news, no longer even elicit much comment.

Another way of stating the need is simply to mention some objects or collections that have recently been offered to the Smithsonian. These include what is probably the finest collection of African art in private hands in this country; the most important set of murals painted by Thomas Hart Benton; a collection of more than 100 paintings of American Indians by Henry Inman; an unparalleled collection of more than 7,000 portrait photographs and photographic negatives from the era of the Civil War, including many of the most important photographs of Abraham Lincoln and most of the portrait photographs by Matthew Brady; and an extremely important sculpture by Gonzales, a work of great historical and aesthetic importance. The prices asked for these objects and collections range from \$1.250 million to approximately \$4 million; and in several cases these prices would be much higher if they did not represent substantial contributions on the part of the owners.

It should also be noted that in several of the instances mentioned above, the Smithsonian's inability to purchase these objects may result in their entering private collections (as did the Turner and the Van Gogh, apparently), while our inability to purchase the collections will in all probability result in their being broken up and sold item-by-item.

What the Smithsonian Has Done: Faced with the need outlined above, the Regents of the Smithsonian voted three years ago to make available \$1 million a year of the Institution's own Unrestricted Trust funds, for an initial period of five years, for major acquisitions by our museums. In addition, faced with the extraordinary case of the Athenaeum portraits of George and Martha Washington, the Regents appropriated an additional \$1.750 million over and above the amount provided by the five-year program. We are particularly proud of the fact that since the inception of this program a Smithsonian expenditure of \$3.122 million produced matching gifts in money and in kind amounting to \$1.2 million.

The Institution is hopeful that economic conditions, including such factors as inflation and the performance of our auxiliary activities, will permit the completion of the first five-year program and its continuation beyond that period. It is unlikely, however, that the Institution will be able to increase the size of this program in the foreseeable future, and thus we face the prospect that what was intended to be a fund for "major" acquisitions will increasingly be limited to acquisitions in the middle price range. Nevertheless, the Regents have shown their concern in the most tangible way and can be expected to continue to do so to the extent that resources permit.

How the Fund Would be Administered: The Institution is proposing that the major acquisitions funds be appropriated without fiscal year limitation. If this were done, each of our museums would be invited to submit proposals, through regular administrative channels, to the Secretary whenever important opportunities arose. Each such proposal would require the endorsement of the museum's director and its board, commission or council; each proposal would describe thoroughly the object or collection and discuss the importance of its acquisition; and each would contain evidence of the appropriateness of the proposed purchase price.

Although a formal allotment of these funds among the participating museums is not contemplated, the Institution would endeavor over the long run to apportion the funds equitably among the museums.

Depending upon the size of the fund, the Institution would establish a minimum amount for the purchase of a single object or collection in order to insure that this special fund would not be used for the smaller but nevertheless important purchases that are covered by each museum's own appropriation or by Smithsonian Trust funds.

Following an initial appropriation, a full report of all acquisitions under the program would be submitted to the Office of Management and Budget and to our appropriations committees in the Congress annually. As the initial fund became depleted additional appropriations would be requested sufficiently far in advance so that an adequate balance could be maintained to meet opportunities as they arise.

How Large Would the Fund Be? This is of course the crucial question, although it must be admitted that in a sense any answer is necessarily rather arbitrary. Given current prices, as alluded to above, there is no doubt that the Smithsonian could spend tens of millions of dollars each year on acquisitions of the very greatest appropriateness and importance for the National Collections. Since, in a sense, the need is almost limitless, it is probably more useful to consider the situation of the Smithsonian's national museums in comparison with other, similar public and private museums in this country and abroad. The three tables below show this situation quite clearly, based upon the latest information available to us.

TABLE I
Smithsonian Acquisition Expenses FY 1980
((\$000))

<u>Museum</u>	<u>Total</u>	<u>Federal Funds</u>	<u>Trust Fund Program</u> ^{/1}	<u>Restricted Endowments</u>
Cooper-Hewitt	\$ 12	\$ 0	\$ 0	\$ 12
Museum of History & Technology	190	80	100	10
National Portrait Gallery	850	300	550	--
National Collection of Fine Arts	400	200	200	--
Hirshhorn Museum & Sculpture Garden	418	218	200	--
Freer Gallery of Art	400	--	200	200
Museum of Natural History	100	--	100	--
Museum of African Art	50	--	50	--
Total	\$2,420	\$798	\$1,400	\$222

^{/1} The expenditures under the 5-year Trust fund program have been prorated to reflect an average year; the extraordinary one-time expenditure for the acquisition of the Stuart Portraits has similarly been prorated on the National Portrait Gallery line.

TABLE II
Acquisition Funds of Selected North American Museums
1977-1979
(\$'000)

<u>Museum</u>	<u>1977</u>	<u>1978</u>	<u>1979</u>
Los Angeles County Museum	\$2,454	\$2,540	\$1,158
Metropolitan Museum of Art	6,737	3,438	3,653
Boston Museum of Fine Arts	2,300	1,700	1,686
Cleveland Museum	2,056	3,669	4,868
Detroit Institute of Arts	N/A	1,731	2,000
Art Institute of Chicago	1,042	882	1,474
National Museums of Canada	2,642	5,024	1,587

TABLE III
Appropriated Acquisition Funds of British National Museums
FY 1980 and 1981
(\$'000)

<u>Museum</u>	<u>Purchase Grants Provided</u>	
	<u>FY 1980</u>	<u>FY 1981</u>
British Museum	\$2,435	\$3,610
Science Museum	248	845
Victoria and Albert Museum	2,261	2,689
Imperial War Museum	167	214
National Gallery	6,216	7,399
National Maritime Museum	367	581
National Portrait Gallery	581	693
Tate Gallery	3,001	4,493
National Galleries of Scotland	1,630	2,118
National Museum of Antiquities of Scotland	219	286
Total	\$17,125	\$22,928

As one can see from these tables, all eight Smithsonian national museums together have approximately \$2.4 million dollars to spend each year on acquisitions--an average, in other words, of approximately \$300 thousand per museum. By contrast, leading private museums in this country and national museums abroad tend to spend amounts on the order of \$2 or \$3 million dollars.

In view of these orders of magnitude, and recognizing again that any particular figure is somewhat arbitrary, the Institution is proposing the establishment of an appropriated acquisitions fund for all eight Smithsonian national museums at an initial level of \$10 million, with the objective of maintaining the fund at approximately this level by further annual appropriations as expenditures are made each year. In some years there might be no expenditures under this program, while in others the expenditures might rise as high as perhaps five or six million dollars. This will depend upon the nature, the importance, and the urgency of opportunities that might arise from time to time. At the moment, we would estimate that the average annual expenditure, and thus the average need for additional appropriations after the first year, would be in the range of three to five million dollars.

ENHANCEMENT LEVEL DECISION PACKAGE 1000-15
Smithsonian Institution
 Salaries and Expenses: 33-0100-0-1-503

Activity description: Facilities Management, Protection Services, and Administration II. Resources requested in this decision package (\$458 thousand) will be used to purchase the majority of photo copier equipment that presently is leased throughout the Institution.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This Package</u>	<u>Cumulative Total</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
Budget Authority (\$000)	107,764	118,838	458	142,580	156,695	160,412	166,895	176,733
Outlays (\$000)	106,987	117,759	416	136,231	154,833	159,905	166,258	175,780
Full-time equivalent employment (workyears)								
Full-time permanent	3,360	3,360	-	3,450				
Total	3,735	3,760	-	3,881				

Short-term objective:

- To purchase copying machines that are presently leased in order to realize a cost savings of approximately \$960 thousand over an equipment operating life of seven years.

Impact on major objectives:

With funding at this level, the total resources devoted to facilities management, protection, and administration would increase from \$68.9 million requested at the first enhancement level (Decision Package 1000-10) to \$69.3 million.

Other information:

As one in a series of planned reviews, the Institution's internal auditors completed an evaluation of the management and usage of copying machines by Smithsonian bureaus and offices in April 1980. The results of this review indicate that generally this equipment is put to effective and proper use. However, this effort did identify a means for significant cost savings through the acquisition of copiers along with steps to enhance overall management of this class of equipment.

Approximately seventy of over one hundred copying machines in use are leased. Virtually all of these machines serve a long-term need for duplication appropriate at the unit level. The FY 1979 cost of purchase versus lease is summarized as follows:

(\$000s)

	Purchase Cost of Copiers	+	Annual Maintenance Cost	=	Acquisition Cost	vs.	Current Annual Rental
First Year	\$643		\$102		\$745		\$330
Second Year	-0-		102		102		330
10th Month - 3rd Year	<u>-0-</u>		<u>84</u>		<u>84</u>		<u>275</u>
Subtotal 2 years, 10 months (break even point)	643		288		931		935
Final 4 years, 2 months	<u>-0-</u>		<u>423</u>		<u>423</u>		<u>1,376</u>
Total (seven year period)	\$643		\$711		\$1,354		\$2,311

As shown above, the break even point, when total rent approximates the acquisition cost, would occur at two years, ten months and savings for the remaining portion of useful life estimated to be seven years would total about \$960 thousand. (This amount represents the difference between the estimated rental and acquisition costs over the seven year period.) In addition, the elimination of a small number of copiers and the shared use of other machines could produce other savings that could total about \$30 thousand per year.

The purchase of leased machines essential to effective unit administration offers the opportunity for significant cost savings. Accordingly, a sum of \$458 thousand is requested in FY 1982 to accomplish this objective. This sum represents the first-year costs of purchase shown in the above table (adjusted by an anticipated price increase during 1980-1981) and annual maintenance costs less the funds now used for rental which will be applied toward these purchases. Once the machines are purchased in FY 1982, savings in subsequent years could be proposed for redirection to other important program needs.

DECISION PACKAGE SET
Smithsonian Institution
(0129)

Construction: 33-(0132)-0-1-503
(0133)

Decision Unit 2000

Introduction:

The Smithsonian's facilities consists of 12 museum and gallery buildings in Washington, D.C. and New York City housing a wide range of exhibitions in the fields of science, history, technology and art as well as research and collections management activities. These facilities range in age from new to well over 100 years old. In addition, the Institution operates and maintains a National Zoological Park on 156 acres in Rock Creek Valley with an associated conservation and research center near Front Royal, Virginia; the preservation, storage, and air spacecraft display facility at Suitland, Maryland (also the site of the planned Museum Support Center); centers for biological research, conservation and education in Panama and on the Chesapeake Bay in Edgewater, Maryland; a center for astrophysics in Cambridge, Massachusetts, and an observatory on Mt. Hopkins in Arizona; and a number of administration, storage, reference, distribution, and other supportive facilities located primarily in leased space. The Smithsonian maintains almost all of the properties which it holds, and substantial work is required to keep them in good repair. The needs and demands are multiple. For example, the museums should be places where visitors derive pleasure from viewing the collections and learning about what they symbolize or what they can tell us about our own history. Over 27 million visits to the Smithsonian museums and the National Zoological Park are recorded each year. In order to promote a sense of welcome and a desire to discover, the physical condition of the given museum must be good. The Institution also has the legal responsibility to serve as the official repository of the National Collections (20 U.S.C. 41, et seq.), and, as such, must maintain a proper environment for art objects, live animals, natural specimens, and artifacts. Visitors and staff safety and security also demand that facilities are in proper repair. The Occupational Safety and Health Act of 1970 (29 U.S.C. 651 et seq.) requires all employers to assure that their work places conform to certain safety and health standards. Several Smithsonian buildings are included on the National Register of Historic Places, which imposes a special responsibility under the provisions of the National Historic Preservation Act to insure that they are preserved in a manner consistent with their status. Greater awareness and attention to the needs of disabled persons, as reflected in the enactment of recent legislation, have resulted in the establishment of additional requirements for all of the Institution's facilities in order to make them more accessible to all visitors and staff. Finally, new program objectives or research needs at the Smithsonian's outlying facilities present additional requirements for repair and renovation work. By maintaining and developing these facilities, the Smithsonian can continue to be in the forefront of research in several major fields of study.

Long-range goals:

- To maintain a physical plant containing adequate and secure space in an environment that provides relatively constant temperature and humidity conditions for proper conservation, housing, display, and study of the National Collections, and that ensures the safety, security, and accessibility of the staff and public who work in, or visit, these facilities.
- To complete the Master Plan for the National Zoological Park approved by the Commission of Fine Arts and the National Capital Planning Commission in FY 1973.

Major objectives:

- To correct structural and systems deficiencies in a physical plant containing over 3.0 million net square feet, with buildings ranging in age from new to over 100 years of age with a replacement value of over a billion dollars.
- To promote energy efficiency and conservation.
- To comply with legislative requirements on occupational health and safety and needs of disabled persons.
- To plan for, and construct new facilities to meet the exhibitions, research and collections management needs of the Institution.

The performance of the following activities will ensure that these objectives will be met.

- Major restoration and renovations, generally of a long-term nature and benefit to the Institution, which are beyond the capability of the Institution's maintenance staff. These projects include repairs to roofs and building exteriors, repairs and alterations to utility systems to provide improved, energy efficient environments within the buildings, and other repairs and improvements of a more general nature.
- Implementation of comprehensive fire protection master plans and installation of fire detection and suppression systems.
- Provision of access for the disabled, correction of unsafe conditions and installation of security equipment for a proprietary alarm system. This category includes projects that will provide greater security, health, and safety for the collection, as well as for the staff and the visiting public and facilities modifications to mitigate or eliminate existing architectural barriers.
- Modifications of facilities to meet program objectives, such as the development of the Smithsonian Astrophysical Observatory at Mt. Hopkins, Arizona, improvements to collections storage buildings at Suitland, Maryland, and development of a comprehensive facilities plan at the Smithsonian Tropical Research Institute in Panama.

-- Construction of a major exhibit included within the Zoo Master Plan.

Alternatives:

1. Provide no additional space. This alternative would seriously impair and disrupt planned and currently organized programs and activities of the Institution that are fundamental to its research, exhibition, and educational missions.
2. Increase rental space. This approach would be costly on a long-term basis and would be subject to inflation and other cost-escalating factors. Scattered locations would increase logistical support and protection costs and would require duplication of staffing and associated laboratory and other support spaces. Moreover, it is likely that extensive modifications would be necessary to adapt leased space for the unique space and environmental needs associated with collections storage, conservation, and research.
3. There is no alternative to performing necessary repairs and improvements to Smithsonian facilities. Failure to improve the physical plant will endanger the well-being of the collections, the visiting public and the staff; result in costly operating inefficiencies and increased energy consumption as building systems (electrical, plumbing, heating, ventilation, and air conditioning systems) cease to function properly; result in the deterioration of building exteriors; contribute to a gradual degradation in the appearance of the buildings, and make it impossible to comply with existing legal requirements pertaining to occupational health and safety and accessibility for disabled persons.
4. Regarding the performance of work, there are two alternatives: 1) accomplish the work entirely by contract, and 2) use Smithsonian labor to perform all or certain aspects of the work. Most routine repairs are performed by the Office of Plant Services for Mall museums and by the Zoo's own maintenance staff at the Rock Creek Zoo and Front Royal Conservation and Research Center. Construction and improvement work is accomplished primarily by contract except in instances when suitable contractors cannot be located, or their estimates are exorbitant in relation to the proposed job. In such instances, accomplishment of the work by other means, such as the purchase of supplies, materials, and equipment and/or use of current staff or temporary labor, is the most economic alternative. Furthermore, it is necessary occasionally to fund other expenses from this account, particularly those at the Zoo associated with the displacement of animals as a result of the construction program or major grounds maintenance in repair of storm damage.

Accomplishments:

- Restoration and Renovation of Buildings - Significant progress has been made in strengthening the Restoration and Renovation of Buildings program to assure the maintenance, preservation and development of the Institution's facilities. During the next five years, special emphasis will be given to improving the efficiency and reliability of heating, ventilating and air conditioning systems, as well as to repairing and renovating building exteriors. The improvement of fire protection systems will continue, as will projects designed to provide a more safe and accessible environment for visitors and staff.

Facade, roof and terrace repairs. During FY 1980, detailed measured drawings and specifications for the renovation of the Renwick Gallery facade were completed. Several full-scale precast concrete samples (planned as a replacement for the Gallery's natural stone) were produced, and testing and evaluation of these samples were initiated. With funds appropriated in FY 1980 and FY 1981, the first major construction phase will begin. Planning and design for the remaining work required to renovate the exterior of the Arts and Industries Building progressed during FY 1980. Major requirements include completion of the roof replacement, window repairs, repointing of the masonry facade, and replacement of gutters and downspouts. During FY 1981, construction will focus on the next roof replacement phase. Other major projects in this category scheduled for FY 1981 include: the initiation of repairs and improvements of the facade and terrace of the National Air and Space Museum; continuation of terrace repairs at the History and Technology Building (HTB); the first phase of recaulking of the HTB facade; and completion of the roof replacement at the Fine Arts and Portrait Galleries Building.

Fire detection and suppression systems. The master plan for upgrading the fire protection system at the History and Technology Building was completed in FY 1980, and the first major implementation phase will be undertaken in FY 1981. In the Natural History Building, the installation of a sprinkler system in the west wing and of a control and alarm system are nearing completion. During FY 1981, the implementation of the building's fire protection master plan will continue. Next construction phases will include the installation of additional smoke detectors, an emergency generator, an east wing sprinkler system and fire walls and divisions. Also during FY 1981, additional smoke detectors will be installed in the Smithsonian Building and the Freer Gallery, and both detection and suppression systems will be provided in several storage buildings at the Suitland facility.

Access for the disabled, safety and security and correction of hazardous conditions. At the Natural History Building, improved access for the disabled has been provided at the north entrance by the construction of curb cuts and permanent ramps and the installation of automatic doors. Major progress was made in FY 1979 and FY 1980 to make the Hirshhorn Sculpture Garden fully accessible, and the final phase of this significant undertaking is scheduled for FY 1981. Progress continues toward completing the conversion from a leased security and fire protection system to an Institution-owned and controlled system. Security equipment for this proprietary system is required in the coming years.

A conceptual plan for improving entrance access at the Freer Gallery has been completed, and planning for improved entrance access at the Smithsonian Building is underway. Restroom and exhibit modifications to improve accessibility are continuing.

The containment or removal of asbestos insulation in Smithsonian facilities will be a major focus of attention over the next five years, and substantial Restoration and Renovation resources will be applied toward the correction of this problem beginning in FY 1981 to accelerate the work already begun by the Institution's maintenance staff. Asbestos insulation has been identified in the Arts and Industries, Fine Arts and Portrait Galleries, History and Technology and Natural History Buildings and in buildings at the Suitland facility.

Utility systems repairs and improvements. During FY 1981, comprehensive studies and detailed designs will be initiated to prepare for the major renovation of the heating, ventilating and air conditioning (HVAC) systems in the History and Technology, Natural History and Arts and Industries buildings. This effort, which will emphasize energy conservation, will result in plans for upgrading building operating systems and replacing unsatisfactory equipment with energy-conserving equipment capable of maintaining environmental controls necessary for the protection of the collections. Funds for major replacements and improvements will be requested in future years. The first major construction phase of the Freer Gallery's HVAC system renovation will begin in FY 1981, and electrical, plumbing and other projects will be undertaken in several other buildings.

Other projects. Construction of a maintenance building at the Chesapeake Bay Center will be completed in early FY 1981; and the design for improvement of the Center's water supply and distribution systems was completed in FY 1980, and construction is scheduled for FY 1981. At the Smithsonian Tropical Research Institute, a maintenance and storage building on Naos Island will be upgraded and modified to provide laboratory space for the Institute's Coral Ecology Laboratory, and a variety of repairs and minor improvements will be accomplished at facilities on Barro Colorado Island. Design and construction of improvements for the Museum of History and Technology's conservation laboratory facilities will begin in FY 1981. At the Smithsonian Astrophysical Observatory's Mt. Hopkins Observatory, construction of a support building to connect two existing telescope buildings will be completed in FY 1980, and construction of a new dining/room building at the summit, begun in FY 1980, will be completed in FY 1981.

- The National Zoological Park - Implementation of the Master Plan construction program continues on schedule. In January 1980, the Reptile House closed to undergo major renovation. When completed in the first part of FY 1981 the building will have improved animal enclosures and the basement will be converted into a nocturnal animal hall that will hold 30 species of nocturnal animals. The North American Mammals Exhibit opened to the public in May 1980. This facility is in keeping with the Zoo's overall emphasis on natural habitats and will house cougars, bobcats, porcupines, prairiedogs, jaguars, kit foxes and fishers. Also scheduled for completion in FY 1980 is the totally new Great Ape House. This 20,000 square foot structure will provide a fully air-

conditioned and controlled environment for orangutans and gorillas in interior glass-fronted habitats, as well as spacious exterior yards. In August 1980, a contract was awarded for the design phase of the Aquatic Habitats Exhibit. This facility, scheduled for the first phase of construction in FY 1982 with funds sought in this budget request will include a cluster of exhibits that will house penguins, sea birds, platypuses, sea otters, a coral reef and a tidal basin. In September 1980, a contract will be awarded for the renovation of the Small Mammals Building. The contract calls for the replacement of all cages and partitions with modern glass-fronted exhibits. Funds anticipated in FY 1981 will permit the construction of the Monkey Island Exhibit. This exhibit will be the final project within the Central Area Complex. The facility will have both indoor and outdoor spaces for the animals as well as a moat which will serve as a containment barrier.

DECISION PACKAGE 2000 - 1;2;3

Smithsonian Institution

(0129)

Construction: 33-(0132)-0-1-503

(0133)

Activity description: Resources are requested for restoration and renovation of the physical plant; and for construction projects at the National Zoological Park.

The Restoration and Renovation of Buildings Appropriation account (R&R) is used to fund building repairs, alterations, and improvements, as well as the construction of additions to existing facilities and minor new facilities. The total request for the R&R account in this package is \$8.5 million. This request, which builds on the Institution's amended appropriation request of \$8.039 million in FY 1981, reflects the Institution's continuing commitment to address the needs of a large and diverse physical plant. The R&R request is divided into the following six categories: general repairs and improvements; facade, roof and terrace repairs; fire detection and suppression systems; access for the disabled, safety and correction of hazardous conditions; utility systems repairs and improvements; and other projects in support of programmatic needs.

For the period FY 1982 - FY 1986, the Institution has identified important projects in these categories that are estimated to cost more than \$52.8 million. The FY 1982 request is intended to address those projects that are needed most urgently.

Energy conservation is supported by Restoration and Renovation resources, particularly where funds are applied toward improving the efficiency of building utility systems and toward maintaining building exteriors.

The National Zoological Park Construction and Improvements account is used to continue to make progress on the approved Master Plan for the improvement of the animal and the public facilities and to perform essential renovation, repair, and improvement projects at the Rock Creek Park Zoo and at the Conservation and Research Center in Front Royal, Virginia. The total request for the Zoo Construction account in this package is \$7.150 million. The requested funds will be used to begin construction of one of the last major exhibits under the Master Plan - an Aquatic Habitats exhibit. Zoo funds are sought also for completion of a Delicate Animal Facility at the Front Royal Conservation and Research Center and for necessary restoration and renovation work both at Rock Creek and Front Royal.

Planned projects in this decision package include the following:

General repairs and improvements. Essential repairs will be funded from this category, including projects to improve lighting efficiency, interior painting and patching, floor repairs, roadway and sidewalk repairs, and other similar projects. In addition, there is provision for emergency repairs such as equipment failures or structural defects that cannot be anticipated, arising from heavy use, extreme weather conditions, or other circumstances.

Facade, roof and terrace repairs. Major progress will be made on the phased renovations of the Renwick Gallery facade and the Arts and Industries Building roof and exterior; and phased projects of terrace repairs at the History and Technology Building, and caulking of the History and Technology Building will be completed. Caulking and repointing of the facade of the Fine Arts and Portrait Gallery and the Natural History Building will commence, and cleaning and sealing of the Hirshhorn Museum facade will be accomplished. Minor roof repairs will be made to the Anacostia Neighborhood Museum and various storage buildings at Suitland, Maryland.

Utility systems repairs and improvements. This category includes the maintenance, repair, and modernization of the heating, ventilating, and air conditioning systems (HVAC) as well as plumbing and electrical systems in the Institution's facilities. Progress will be made in the renovation of the heating, ventilating, and air conditioning systems in several buildings, including the Arts and Industries Building, the Fine Arts and Portrait Gallery, the Freer Gallery of Art, the Cooper-Hewitt Museum, the History and Technology Building and the Natural History Building. The renovation of these systems not only will provide better control of temperature and humidity conditions but will promote energy efficiency. Electrical systems safety improvements are scheduled for the Air and Space Museum, the Smithsonian Tropical Research Institute's Barro Colorado Island's facilities, the Smithsonian Institution Building, the Freer Gallery of Art, the Renwick Gallery, and the Cooper-Hewitt Museum. Plumbing repairs are planned for the Cooper-Hewitt Museum, and the water supply and sewage systems at the Smithsonian Tropical Research Institute's Barro Colorado Island's facilities will be upgraded. Funds are included for a comprehensive energy study of the Hirshhorn Museum and Sculpture Garden.

Fire detection and suppression systems. The phased implementation of the master plans for the Natural History and History and Technology Buildings will proceed, smoke detectors and sprinklers will be installed in the Arts and Industries Building and at the Chesapeake Bay Center, and planning and design for fire protection systems will be undertaken for the Barro Colorado Island's facilities at the Smithsonian Tropical Research Institute in Panama.

Access for the disabled, safety and security and correction of hazardous conditions. The first phase of installing Mall security lighting will be undertaken, asbestos insulation in several facilities will be contained or removed, security equipment for the Institution's proprietary alarm system will be installed and building entrances and restrooms will be modified to accommodate the disabled.

Other projects. Funds are being requested to continue the multi-year program to improve and maintain the hazardous, single-lane access road built in 1967 at the Smithsonian Astrophysical Observatory's Mt. Hopkins Arizona Observatory, to make necessary improvements to the Museum of History and Technology's storage buildings in Suitland, Maryland, and to develop a master plan for the development and renovation of the facilities of the Smithsonian Tropical Research Institute in Panama.

National Zoological Park Construction. Construction will continue at the National Zoological Park following the general outlines given by its Master Plan. In this package, funds of \$6 million are sought to begin construction of an Aquatic Habitats exhibit at the Rock Creek Park Zoo. (Funds of \$3.3 million to complete the project are expected to be sought in FY 1983). The Aquatic Habitats exhibit will consist of a cluster of exhibits that will house penguins, sea birds, platypuses, sea otters, a coral reef and a tidal basin. An additional amount of \$350 thousand is requested to construct the second phase of a Delicate Animal Facility at the Front Royal Conservation and Research Center. The first phase of the facility, constructed with funds appropriated in FY 1980, is designed for small mammal breeding. The portion to be built with funds sought in FY 1982 will provide housing for the delicate birds that are hatched at the Conservation and Research Center. An additional amount of \$800 thousand is sought for necessary structural, mechanical, electrical, utility and plumbing repairs and renovations as well as grounds and roadway improvements both at Rock Creek and Front Royal.

Resource requirements:	1980	1981	1982		Planning Estimates			
			This Package	Cumulative Total	1983	1984	1985	1986
Budget Authority (\$000)	32,100 ^{/1}	11,329	4,321	15,650	18,650	20,730	19,270	28,950
Outlays (\$000)	7,700	18,933	6,241	25,174	17,919	18,061	16,385	17,620
Full-time equivalent employment (workyears)								
Full-time permanent	-	-	-	-				
Total	20	15	-4	11				

Short-term objectives:

- Ensure the basic operation of all Smithsonian facilities.
- Perform necessary facade, roof and terrace repairs to maintain facilities in a weathertight, energy efficient condition.
- Progress toward implementation of fire detection and suppression master plans.

^{/1} Includes amount of \$20.6 million for construction of the Museum Support Center.

- Promote the safety and security of visitors and staff, and continue to improve access for the disabled to Smithsonian buildings and facilities.
- Progress toward renovation of the heating, ventilating, and air conditioning systems of several major museums to provide better control of temperature and humidity conditions and to assure energy efficiency and conservation.
- Continue construction at the Zoo in line with the Master Plan.

Impact on major objectives:

- The physical plant will be maintained at a level necessary to sustain current program activity.
- Through repairs to facades, roofs and terraces and renovation of heating, ventilating, and air conditioning systems, energy efficiency will be encouraged.
- Major improvements will be accomplished toward correcting occupational health and safety hazards and easing accessibility for disabled persons.
- Improvements to off-Mall facilities will be accomplished in support of the research and collections management needs of the Institution.

Other information:

- In July 1980, the Institution formally established a comprehensive energy management program mindful of spiraling costs and shortage of energy resources. This program aims toward conserving and promoting more efficient uses of energy. A significant portion of the request in the Restoration and Renovation of Buildings Appropriation account bears directly on energy conservation and energy efficiency, specifically those projects related to renovation of heating, ventilating, and air conditioning systems and to facade, roof and terrace repairs.
- It is anticipated that all projects not funded at this level, or at succeeding levels, will be affected by the future impact of inflation.

-- The following projects will be funded at this level:

	(\$000)
<u>Restoration and Renovation of Buildings</u>	
General Repairs and Improvements	\$ 845
Facade, Roof and Terrace Repairs	2,965
Fire Detection and Suppression Systems	750
Access for the Disabled, Safety and Security and Correction of Hazardous Conditions	980
Utility Systems Repairs and Improvements	2,260
Other Projects:	700
Smithsonian Astrophysical Observatory-access road (\$500)	
Smithsonian Tropical Research Institute-development of facilities master plan (\$50)	
National Museum of History and Technology-improvements to Suitland, Maryland collections storage buildings (\$150)	
Subtotal, R&R	<u>\$8,500</u>
<u>National Zoological Park, Construction and Improvements</u>	
Aquatic Habitats Exhibit (partial funding)	\$6,000
Rock Creek Repairs and Improvements	500
Front Royal Delicate Animal Facility (phase 2)	350
Front Royal Road Resurfacing	100
Front Royal Repairs and Improvements	200
Subtotal, National Zoological Park	<u>\$7,150</u>
Total, All Construction <u>/1</u>	<u><u>\$15,650</u></u>

/1 Does not include request of \$24,135,000 for Quadrangle development which is being submitted in a separate decision package set.

DECISION PACKAGE SET
South Quadrangle Construction
Construction: 33-(0133)-0-1-503
Decision Unit 3000

Introduction:

This decision unit is devoted exclusively to the Smithsonian's South Quadrangle development project for which construction funds of \$24.135 million are requested in FY 1982. The South Quadrangle is an area of approximately 4.2 acres located between the Smithsonian Institution Building and Independence Avenue.

Since 1979, the Institution in consultation with contract architects and engineers has been planning and designing the proposed facilities in the South Quadrangle in order to meet a number of exhibition, research, education and other public service needs. To date, funds of approximately \$680 thousand of the Institution's nonappropriated Trust funds have been used for planning and design purposes.

The design concept that has been developed consists of three building elements, including two new museums. The first, to be located on the west side of the Quadrangle adjacent to the Freer Gallery of Art, will provide approximately 78,000 square feet for a new center for the exhibition of Eastern art and Eastern studies. Space would be available to the Freer Gallery of Art for conservation, research, storage, and other museum purposes. A second building on the east side will provide approximately 85,000 square feet for the Museum of African Art. Both museums are designed to be low-profiled pavilions, distinctively and delicately styled allowing virtually a full view of the Smithsonian Institution Building from Independence Avenue. The third element, located entirely beneath the Quadrangle, will provide an education center for the National and Resident Associates Programs, public space for the Smithsonian Institution Traveling Exhibition Service, a rare book library, and parking.

Important programs of the Museum of African Art and the Freer Gallery would be immensely strengthened by the proposed project. For example, by providing a Mall site for the Museum of African Art, the Quadrangle development will give the Museum immediate visibility as an important national resource at once greatly increasing the number of visitors and helping the public gain a long overdue appreciation of the traditional art forms of African culture. The legislative history of Public Law 95-414, which authorized the transfer of the Museum to the Smithsonian and was signed by the President on October 12, 1978, suggests that the Museum be moved from its present location on Capitol Hill. Such a relocation to the Mall would serve a variety of purposes, benefiting both the care of the collections and the interests of the public, including larger exhibition spaces, proper storage and care for the Museum's collections, improved accessibility to students and scholars, better security, and parking.

The extension of the Freer Gallery of Art would provide needed space and program flexibility in the exhibition of Eastern art. (Restrictions in the Freer Will prohibit the display of traveling exhibitions or temporary loans in the Freer Building.) In addition, the extension will help attract additional important collections, and allow for growth in important museum activities, particularly in research and education.

Long-range goals:

- To accommodate the collection of the Museum of African Art and to provide additional space and flexibility for the collection and exhibition of Eastern art.
- To meet vital additional exhibition, research, collections management, and public education space needs of the Institution.

Major objective:

- To construct new facilities in the South Quadrangle which will provide a permanent home for the Museum of African Art, a center for Eastern art in association with the Freer Gallery of Art, an education center for the National and Resident Associates, public galleries and administrative space for the Smithsonian Institution Traveling Exhibition Service, a rare book library and underground parking.

Accomplishments:

- In FY 1978 and FY 1979, the Board of Regents authorized the Smithsonian to use \$165 thousand of nonappropriated Trust funds to develop preliminary design concepts, a program of space requirements and various engineering and construction data on existing conditions of the subsurface and adjacent foundations. Consultants were engaged to initiate planning and design. A sum of \$1.250 million was also set aside in FY 1979 for further design work in FY 1981, to be used in conjunction with a Federal appropriation.
- Public Law 96-36, signed by the President on July 20, 1979 authorized planning for the project.
- In FY 1980, the Board of Regents provided an additional amount of \$1 million of the Institution's nonappropriated Trust funds, of which some \$500 thousand was to continue program planning and design development. The firm of Shepley, Bulfinch, Richardson, and Abbott (SBRA) was selected in February 1980 to continue the design development for the Institution assisted by Mr. Junzo Yoshimura, a Japanese architect, as design consultant.
- The Institution, assisted by the architectural firm (SBRA), presented a model of a refined concept to the Commission of Fine Arts on April 8, 1980 and the National Capital Planning Commission on May 1, 1980 for information and comment. The firm of E. Verner Johnson and Associates was recalled to revise and update a detailed program of space requirements, and the firm EDAW, Inc., is currently preparing an Environmental Impact Statement to meet the requirements of the National Environmental Policy Act.
- The General Services Administration, which is providing management for the project development, has negotiated a phased contract with SBRA for the complete design project; award is pending. This contract, valued at approximately \$2 million, will provide working drawings and other appropriate contract documents by late 1981.

-- Meanwhile, preliminary site and building plans are scheduled to be presented for approval to the National Capital Planning Commission in November 1980. The Environmental Impact Statement process will be completed in September 1980, and the project will be presented for approval to the Joint Committee on Landmarks for the District of Columbia later that month.

Legislative Schedule and Construction Timetable:

The Institution plans to seek full construction authorization for the project early in FY 1981. The present timetable for the Quadrangle calls for a construction contract to be let in early 1982 with project completion expected after three years. The necessary funds for construction must be pledged firmly or available by early 1982 if the Institution is to adhere to this plan.

Financial Plan:

The planning and design activities have been coordinated to complement each other in a logical fashion and at minimum cost. If the Institution can secure construction authorization in 1981 and construction funding in FY 1982, the project can be completed in 1984-85 within the estimated cost of \$49.1 million.

The tentative financial plan indicates that the Institution will look to five sources for support. They are:

- (1) Smithsonian Trust funds - \$9.250 million - The Institution projects that it will be able to set aside between \$1.0 to \$2.0 million per year from net revenues of auxiliary activities between now and FY 1985. This estimate is based on continued success of these activities, including primarily the Magazine, and may require adjustment to the extent that outside fund raising exceeds its projection or as other priorities of the Institution require.
- (2) Future Parking Revenues - \$6.215 million - The full cost of the parking garage in the Quadrangle is anticipated to be financed from future parking revenues of that facility. Construction funds would have to be advanced as an investment from some sources, which may include the Institution's Unrestricted Endowment Funds.
- (3) Sale of Museum of African Art real estate - An amount of \$1.5 million is projected from the sale of nine townhouses on Capitol Hill excluding the Frederick Douglass House.
- (4) Contributions - \$7.5 million - Fund raising has been actively pursued since April 1979 when Secretary Ripley visited Tokyo to discuss a Center for Eastern Art with Japanese government and industry leaders. Subsequently, the late Prime Minister Ohira pledged \$1 million toward the new museum's construction, and this pledge was fulfilled in April of this year. The Institution has an ambitious goal of securing an additional \$6.5 million from foreign and domestic governments, corporations and individuals for various segments of the total project. A campaign to raise \$2 million of this amount is now underway under the leadership of William Anderson, Chairman, NCR Corporation and also Chairman of the National Board of Smithsonian Associates. Another effort is being planned to help fund the construction of the

Museum of African Art. The Secretary and other officials of the Institution have continued to develop foreign corporate sources for an additional \$3 million in financial support. In the event that contributions exceed this target, the need for the Federal appropriations would be reduced accordingly.

- (5) Federal Appropriations - \$24.635 million - The remaining \$24.635 million or slightly over one-half of the total project cost is anticipated from appropriated funds.

The funding of the project is envisaged as a joint enterprise between appropriated and nonappropriated sources. The Board of Regents has been kept informed of all phases of this effort and has received a presentation of the proposed ways through which nonappropriated funds could be raised.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This</u>	<u>Cumulative</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
			<u>Package</u>	<u>Total</u>				
Budget Authority (\$000)	-	500	23,635	24,135	-	-	-	-
Outlays (\$000)	-	500	2,500	3,000	12,000	9,135	-	-

DECISION UNIT OVERVIEW
Smithsonian Institution
Museum Programs and Related Research
(Special Foreign Currency Program): 33-0102-0-1-503
Decision Unit 4000

Long-range goal: To continue the administration of a national grants program in excess foreign currencies that is responsive to the needs of the academic community, the Smithsonian, and the participating host countries.

Major objectives:

-- To support the increase and diffusion of knowledge by making grants in the excess foreign currencies of India, Pakistan, and occasionally Burma and Guinea to United States' institutions for "museum programs and scientific and cultural research and related educational activities." These projects are carried out in the host countries in collaboration with those countries' institutions in the fields of archaeology, systematic and environmental biology, astrophysics and earth sciences, and museum programs. Projects which have been funded in the past are continuing in Egypt, Tunisia, Poland, Sri Lanka, and Yugoslavia. No money to start new projects is available in these countries. Although one year funding is the general program rule for all grantees, multi-year funding is offered occasionally for meritorious research. This support, which is granted only after careful review of the success of the research project, has the advantage of assuring funds for continued work in succeeding seasons.

-- To continue to add to the American Institute of Indian Studies forward-funded reserve to insure funding for this important United States scholarly activity after depletion of the United States Indian rupee account.

-- To contribute to the salvage project at Moenjodaro, Pakistan so that the ancient urban sites can be saved from further disintegration due to damaging environmental conditions.

Alternatives:

Alternatives to the current administration of the grant awards program are:

-- Contract research which directs scholars to study programs as they are defined by the Institution.

-- Abandon the national grants program while seeking a direct appropriation for only the Institution's programs.

The Smithsonian recommends the continuation of its administration of a national grants program in foreign currencies as long as the currencies last. Such a program sustains not only modern research abroad in disciplines of interest to the Institution, but also engenders support for the Institution in academic circles throughout the United States, drawing researchers and advisory council members to the Institution. Moreover, the program can result in new collections for the national museums.

To maintain the support of the academic community, Smithsonian staff members should continue to compete with their colleagues for foreign currency awards. Peer review provides objective and sound critiques of research, and when it is conducted annually, can assist scholars in getting the best results. Competitive review keeps Smithsonian applications up to national standards. Following the recommendation in the House-Senate Conference Report 95-1672 dated September 29, 1978, the National Science Foundation reviews the credentials of the review panelists in all of the academic disciplines represented in the Program and certifies their competence. This process is preferable to contracting for specific research projects or for appropriations only for the Institution's programs. These kinds of predetermined limitations would not assure that the most meritorious proposals would be funded because it would set artificial constraints on funding applications.

Accomplishments:

The Smithsonian Foreign Currency Program anticipates making 75 grants to institutions in 21 states and the District of Columbia by the end of FY 1980. These include funding for continuing and new research projects, research development travel and limited conference and symposium support. The Institution anticipates maintaining a similar level of activity through FY 1982. Work in Egypt will continue at a reduced level with funds to be obligated before the end of 1981 at which time the Egyptian pound will no longer be considered "excess". Work in Burma, as in the past, will be limited but recent communications indicate renewed interest on the part of the Burmese in establishing collaborative projects. Program activity will continue through FY 1981 in Tunisia, Sri Lanka, Poland, and Yugoslavia. A total of 41 projects require continuation of multi-year funding.

Examples of recent accomplishments resulting from foreign currency projects are:

- Paleontological investigations in the Fayum Depression of Egypt suggest that man's 30 million year old ancestors were already developing the intelligence to deal with complex social surroundings.
- Data from surface surveys and Landsat photographs of the Western Desert of Egypt have uncovered startling similarities to photographs taken of Mars opening new possibilities for geological interpretation of the planet's topography.
- The study of interdependent organisms in some tropical Indian lakes is leading to the development of management principles for biological productivity in freshwater bodies.
- The Special Foreign Currency Program-supported publication "Ancient Cities of the Indus" won the Indian National Book Award for most outstanding scholarly publication of 1979.

- Indian and Egyptian folk puppeteers participated in the World Puppetry Congress in Washington and toured several United States' cities promoting added understanding of the diverse cultures of Asia and Africa.
- The continuing study of the fossil mammal fauna of Pakistan is contributing to the understanding of the timing of the closing of the Tethyan Sea and the collision which joined Indo-Pakistan to central Asia.

Other information:

- Program of grants for field research: The Smithsonian Foreign Currency Program makes grants to United States' universities, museums, and other institutions of higher learning, including the Smithsonian itself, primarily for research and advanced professional training in fields of traditional Smithsonian competence. The Smithsonian program is a major source of support for research carried out by United States' institutions in the excess foreign currency countries. It strengthens the research and training activities of collaborating institutions abroad, for most projects directly involve host country institutions and scholars. Enduring professional ties which result from such joint efforts and scholarly exchange contribute to the strongest form of United States' cultural relations with other nations. Moreover, these ties contribute to the integration of the worldwide advancement of science which serves to narrow the gap between the industrial and the developing nations.
- Moenjodaro - In 1921, two important discoveries were made in the Indus Valley of India, now Pakistan, when archaeologists discovered the remains of the cities of Harappa, near Lahore, and Moenjodaro, about 250 miles north of Karachi. These two cities apparently are the products of the Harappan civilization which flourished over 4,500 years ago, from about 3000 B.C. to 1500 B.C. Moenjodaro, a city of a square mile, is the larger and more impressive of the two sites. From the standpoint of planning, sanitation, and social organization, this city anticipates developments which only blossomed several thousand years later.

The excavated ruins at Moenjodaro have been threatened since their discovery by two main causes of destruction: floods of the Indus River and highly saline ground waters which have caused the serious deterioration of the excavated remains.

Since the 1960s, the Government of Pakistan has appealed to the international community for assistance in salvaging Moenjodaro by diverting the river, lowering the water table, providing remedial action to stabilize threatened buildings and preventing disintegration of those that have not yet been seriously damaged, and installing appropriate landscaping. UNESCO responded to Pakistan's appeal and in 1974, agreed to lead an international fund raising campaign. In the interim, the Government of Pakistan, with the assistance of UNESCO, has conducted a series of technical studies relating to river control, dewatering and other methods conducive to the eventual preservation of the site.

On October 10, 1979, an agreement between UNESCO and the Government of Pakistan for the preservation and development of the monumental site of Moenjodaro was signed. As of December 31, 1979, UNESCO had raised \$1.3 million mainly from governmental contributions of member states. These funds have been deposited in an international trust fund for Moenjodaro. UNESCO has asked the Government of Pakistan to initiate the project during 1980-1981, with an advance of \$400 thousand equivalent from the UNESCO trust fund. The Smithsonian is optimistic that this project, long in the planning stage, will get underway shortly and accordingly the Institution plans to seek a total of \$4 million equivalent in nonconvertible Pakistani currency over a four year period beginning in FY 1982 as the United States' contribution toward this important project.

The Smithsonian is making this request because of its traditional interest in archaeology and cultural history. It was the agent for conveying the final United States' contribution to the International Campaign to Save the Nubian Monuments--the successful effort to move the Temples of Philae. The Smithsonian Special Foreign Currency Program has supported the significant archaeological investigations of Moenjodaro and other Harappan sites which have added greatly to knowledge of this civilization.

As with the Nubian monuments of Egypt, preserving the remains of Moenjodaro will be of great benefit to generations of future scholars. The network of scholarly relations between American institutions and their counterparts in Pakistan will be developed and strengthened. Indeed, the maintenance of cultural ties between nations can provide a link which endures through the shifting of other relations and insures continued contact between nations. Finally, support by the United States for the preservation of this unique historic site is in the spirit of the UNESCO convention concerning the protection of the world culture and natural heritage (the World Heritage Convention) which was ratified by the United States in 1973.

- Forward-funded reserve for the American Institute of Indian Studies - Founded in 1961 by a consortium of 15 United States' universities and colleges, the American Institute of Indian Studies' purpose is to promote American scholarship at the pre- and post-doctoral level on India in all recognized fields of the humanities and the social and natural sciences. Funding for United States administration is raised through dues paid by member institutions and from foundation grants from several sources. As of 1980 the number of consortium members has grown to 32 with about 100 fellows in India at any given time, in a variety of programs. Funding for research and local administration in India is primarily through the Smithsonian, with lesser amounts being contributed by the Office of Education (language teaching programs only), National Science Foundation (fellowships in specific disciplines), International Communications Agency (fellowships in specific disciplines), and the Ford Foundation.

Through its competitive grants program, the Smithsonian has provided annual funding to the American Institute of Indian Studies for fellowships, research, symposia and publications and for administrative costs. The Smithsonian has helped sustain this Institute and other American research centers abroad for more than a decade because of their significant contributions to scholarship and science without regard for national boundaries and their special service to American scholars conducting research.

While the amount of Indian currency available to the United States government is still large, it is a finite fund in inactive accounts. With inflation rates in India at a high level, it will probably disappear more quickly than had been anticipated in the past. Various estimates are offered for when this may occur; some suggest as early as five years hence. Since the end of "excess" currency status historically has happened suddenly, the Institution proposes to reserve funds for the American Institute of Indian Studies to avoid a situation similar to the one which developed in Egypt. (In late 1978, funds for new American research in Egypt dried up suddenly, placing in doubt the future of American archaeology and cultural history studies there and jeopardizing the continued existence of the very successful Cairo Center of the American Research Center in Egypt.)

By building a substantial foreign currency reserve fund now, the Smithsonian hopes to seize the opportunity to make the American Institute of Indian Studies financially secure on a long-term basis, and to encourage other such centers to make the effort necessary to develop funding from other sources for the period beyond the support by the Smithsonian.

- Egyptian currency situation - The final distribution of remaining "excess" Egyptian pounds was made in late FY 1979, under a control plan developed by OMB, Treasury and Department of State. Although the Smithsonian received a small allocation of these funds, which must be obligated before the end of FY 1981, the Institution's research program in Egypt will be curtailed and terminated before productive projects can be completed. However, we understand that some of the allocation of \$30 million equivalent in Egyptian pounds to the Foreign Building Organization in the Department of State may not be used. If this is the case, we would hope that the unused portion could be reallocated to other organizations on an equitable basis. At the same time, the Smithsonian urges that new sources of P.L. 480 funding in Egypt be examined. Perhaps these funds could be generated through stipulations in new trade agreements with Egypt. Continuation of this funding will allow both the valuable research efforts and the close relationships developed between United States and Egyptian scholars to be maintained.

Package 1 of 1 (minimum, intermediate, current, and enhancement level)

DECISION PACKAGE LEVEL 4000-1;2;3;4

Smithsonian Institution

Museum Programs and Related Research

(Special Foreign Currency Program): 33-0102-0-1-503

Activity description: An appropriation of \$5.5 million equivalent in foreign currencies, which have been determined by the Treasury Department to be in excess of the normal needs of the United States, is requested in FY 1982. The appropriation will be used:

- To continue a program of grants to United States' universities, museums, and other institutions of higher learning, including the Smithsonian itself, primarily for field research and professional training in those countries where excess local currencies are available. Fields of study are in areas of traditional Smithsonian competence, including archaeology and related disciplines, systematic and environmental biology, astrophysics and earth sciences and museum programs. Funding of \$3.5 million equivalent in foreign currencies is sought for this purpose in FY 1982.
- For a United States' contribution to the international effort organized through UNESCO to restore and preserve the Indus civilization city of Moenjodaro in Pakistan. Funding of \$1 million equivalent in Pakistani rupees is requested in FY 1982.
- For a third installment to the forward-funded reserve in support of future programs of the American Institute of Indian Studies (AIIS). An appropriation of \$1 million equivalent in Indian rupees is requested to be added to the amount of \$500 thousand equivalent appropriated in FY 1980 to initiate this program and the \$750 thousand being sought in FY 1981.

<u>Resource requirements:</u>	<u>1980</u>	<u>1981</u>	<u>1982</u>		<u>Planning Estimates</u>			
			<u>This</u>	<u>Cumulative</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>	<u>1986</u>
			<u>Package</u>	<u>Total</u>				
Budget Authority (\$000)	4,200	3,650	1,850	5,500	7,000	7,000	7,000	7,000
Outlays (\$000)	2,989	2,952	1,626	4,578	5,027	5,010	5,003	4,117

Short-term objectives and impact on major objectives:

- Provide continued funding for all academic disciplines which received funding in FY 1981, including funding for new projects and continuation of new multi-year grants.
- Provide the United States' contribution to the international effort to salvage Moenjodaro.
- Add to the forward-funded reserve for the American Institute of Indian Studies.

SMITHSONIAN INSTITUTION LIBRARIES



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